

# EXPERIMENTAL THERMAL CONDUCTIVITY, THERMAL DIFFUSIVITY, AND SPECIFIC HEAT VALUES OF ARGON AND NITROGEN

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Final Report

October 1988



Stimulating America's Progress  
1913-1988



NISTIR 88-3902

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U.S. DEPARTMENT OF COMMERCE, C. William Verity, Secretary

NATIONAL INSTITUTE OF STANDARDS & TECHNOLOGY, Ernest Ambler, Director



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Experimental thermal conductivity, thermal diffusivity,  
and specific heat values of argon and nitrogen

H.M. Roder, R.A. Perkins and C.A. Nieto de Castro

We report new experimental measurements of thermal conductivity and thermal diffusivity as obtained in a transient hot-wire apparatus for argon and nitrogen. Values of the specific heat,  $C_p$ , are calculated from these measured values and the density associated with each measurement. The measurements were made at temperatures between 80 and 320 K with pressures between 0.1 and 70 MPa. The density range is 0 to 36 mol/L for argon and 0 to 32 mol/L for nitrogen. The total number of points recorded is 1484 for argon and 1423 for nitrogen.

Key words: argon; hot wire; measurements; nitrogen; thermal conductivity; thermal diffusivity; specific heat; transient hot-wire.

## 1. Introduction

New accurate experimental measurements of the thermal conductivity of fluids are always of interest. This report is the archival record of results on argon and nitrogen. There is a minimum of text since most of the analysis, explanation and discussion of the results has already been given [1,2,3,4] or will be the subject of future papers.

The measurements were made with a transient hot-wire thermal conductivity apparatus [5] which has been tested with nitrogen [5], helium [5] and argon [6,7]. The system has been used previously to measure the thermal conductivity surfaces of oxygen [8], hydrogen [9,10], methane [9,11], ethane [9,12], methane-ethane mixtures [13,14], and propane [9,15]. The temperature range of the instrument is 77 to 330 K and the pressure range is from near 0 to 70 MPa. The apparatus has been improved considerably during the past few years, so that the thermal diffusivity can be obtained at the same time as the thermal conductivity is measured. The specific heat,  $C_p$ , can be computed from the measured values of thermal conductivity and thermal diffusivity provided that the density and the thermal conductivity are evaluated at the cell temperature. A brief description of the process including the earliest results on argon is given in [2]. A more detailed description of the measurement of thermal diffusivity including an analysis of the various errors is given in [16].

The scheme used to measure the thermal conductivity surface of a fluid is to conduct the measurements along isotherms. The temperature increment is chosen to be around 20 K to give a change of several percent in thermal conductivity between adjacent isotherms. On each isotherm measurements are made at a number of different pressures. The pressure increment is arranged to give a density increment of about 0.5 mol/L. Finally, replicated measurements at the same cell temperature and pressure

are made with three or four different power levels. The replicated measurements verify the absence of convection, and, because the experimental temperatures vary with the applied power level, the measurements are actually independent of each other.

The separate sections for argon and nitrogen give the tables of data and the equation of state used to calculate densities from the measured pressures and temperatures. In the argon table the vapor isotherms are followed by the liquid isotherms and then by the supercritical isotherms. In the nitrogen table vapor and liquid isotherms are intermingled; they are followed by the supercritical isotherms. Within these sections the tables are arranged in order of increasing nominal temperatures, and, within each nominal temperature, the measurements are arranged in order of increasing density. The nominal temperatures are simply the average of all experimental temperatures within a given temperature level rounded to the nearest degree. Recorded in the tables are the run and the point numbers, the pressure, temperature and density of the fluid to which the thermal conductivity is assigned, the applied power per unit length of wire, the experimental thermal conductivity and its 2 sigma value STAT, the cell temperature to which the thermal diffusivity and the heat capacity must be referred, the experimental thermal diffusivity and its 2 sigma value DSTAT, and the derived specific heat, Cp. STAT and DSTAT are the uncertainties of the slope and intercept, at the  $2\sigma$  level, as determined in the data reduction program [5,16]. STAT and DSTAT are direct measures of the precision of the thermal conductivity and thermal diffusivity, respectively. A STAT of 0.001, for example, corresponds to a precision of 0.1 percent in thermal conductivity.

## 2. Results for Argon.

A total of 1484 points are given in table 1. The physical states covered by these measurements include the dilute gas, the moderately dense gas, the extended critical region, the compressed liquid, and the vapor at temperatures below the critical temperature. The equation of state used for argon is given in [17]. The argon isotherms in the compressed liquid region were measured before we had developed the capability to measure the thermal diffusivity; for these isotherms entries for thermal diffusivity and specific heat are omitted. The computer programs developed to give a preliminary representation of the thermal conductivity surface of argon are given below.

```

C FUNCTION ARTC(RHO,T)
PRELIMINARY, COEF. FROM MINIMS AND TCAR1-9, 16 SEP 88
DIMENSION A(2),B(4),EN(3)
DATA A/0.00052,0.0000016/
DATA B/-1425607075E+02
1 , .1007189525E-01 ,-.1906249875E-04, -.2651696550E-08/
DATA EN/
1 .3391791524E+01 ,-.3138158607E-02 , .5773095224E-05/
TERM1=ARGONZ(T)
TERM2=(A(1)+A(2)*T)*RHO
ENN=EN(1)+EN(2)*T+EN(3)*T**2
BEE=EXP(B(1)+B(2)*T+B(3)*T**2+B(4)*T**3)
TERM3=BEE*RHO**ENN
ARTC=TERM1+TERM2+TERM3+ARCRIT(RHO,T)
RETURN
END

C FUNCTION ARGONZ(TIN)
ARGON DILUTE GAS, FROM BEN Y., COEF. FROM FITEQ8, 13 SEP 88
DIMENSION GT(9)
GT(1)= .4829346527E+05
GT(2)= -.7209396392E+05
GT(3)= .4935353973E+05
GT(4)= -.1971677772E+05
GT(5)= .4920399941E+04
GT(6)= -.7743157725E+03
GT(7)= .7450208361E+02
GT(8)= -.3978780834E+01
GT(9)= .9009081489E-01
SUM=0
TT=TIN
TF=TT**(.1./3.)
TFF=TT**(-4./3.)
SUM=0
DO 20 I=1,9
TFF=TFF*TF
20 SUM=SUM+GT(I)*TFF
ARGONZ=SUM/1000.
RETURN
END

C FUNCTION ARCRIT(RHO,TEMP)
PRELIMINARY, COEF. FROM MINIMS AND TCAR1-9, 16 SEP 88
DIMENSION C(7)
DATA C/.1115727044E+00
1 ,-.1490000000E+03 , .4059585658E-02 ,-.1280544934E-04
1 ,-.9918979805E-03 ,-.15230,0.16494/
DATA (TC=150.86),(RHOC=13.41)
T=TEMP
DEN=RHO
IF(T.LT.TC) T=TC+(TC-T)
IF(T.LT.380.) GO TO 4
ARCRIT=0.
RETURN
4 CONTINUE
AMPL=C(1)/(T+C(2))+C(3)+C(4)*T
DELT=T-TC
RHOCENT=RHOC+C(5)*DELT**1.5
DELRHO=DEN-RHOCENT
X1=C(6)*DELRHO
IF(DEN.GT.RHOCENT) X1=C(7)*DELRHO
ARCRIT=AMPL*EXP(-X1**2)
RETURN
END

```

Table 1. The thermal conductivity, thermal diffusivity and specific heat of argon

## Nominal Temperature 103. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
8005	0.193	103.872	0.2333	0.03238	0.00706 0.003	99.930	0.185E-05 0.037	15.0
8006	0.193	103.271	0.2348	0.02736	0.00704 0.003	99.931	0.188E-05 0.040	14.9
8007	0.193	102.718	0.2363	0.02279	0.00701 0.004	99.932	0.186E-05 0.045	15.0
8008	0.193	102.219	0.2376	0.01867	0.00700 0.004	99.931	0.190E-05 0.051	14.8
8001	0.271	103.690	0.3338	0.03243	0.00707 0.003	99.931	0.110E-05 0.032	17.7
8002	0.271	103.116	0.3360	0.02742	0.00705 0.003	99.932	0.109E-05 0.033	17.9
8003	0.271	102.581	0.3380	0.02280	0.00701 0.003	99.933	0.107E-05 0.036	18.3
8004	0.271	102.126	0.3398	0.01884	0.00699 0.004	99.933	0.108E-05 0.042	18.0

## Nominal Temperature 113. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
9009	0.297	113.954	0.3288	0.03658	0.00772 0.003	109.965	0.139E-05 0.033	15.6
9010	0.297	113.351	0.3308	0.03096	0.00769 0.003	109.967	0.138E-05 0.034	15.7
9011	0.297	112.798	0.3327	0.02582	0.00766 0.003	109.967	0.138E-05 0.038	15.8
9012	0.297	112.295	0.3344	0.02116	0.00764 0.004	109.969	0.139E-05 0.043	15.6
9005	0.458	113.666	0.5243	0.03653	0.00780 0.002	109.974	0.721E-06 0.026	19.0
9006	0.458	113.106	0.5275	0.03090	0.00777 0.003	109.973	0.713E-06 0.027	19.2
9007	0.458	112.592	0.5306	0.02577	0.00773 0.003	109.975	0.701E-06 0.030	19.6
9008	0.458	112.130	0.5333	0.02113	0.00772 0.003	109.975	0.720E-06 0.037	19.1
9001	0.636	113.358	0.7565	0.03643	0.00802 0.002	109.980	0.408E-06 0.023	23.9
9002	0.636	112.839	0.7614	0.03085	0.00799 0.002	109.983	0.397E-06 0.024	24.6
9003	0.636	112.367	0.7659	0.02574	0.00796 0.003	109.981	0.387E-06 0.027	25.3
9004	0.636	111.940	0.7701	0.02111	0.00793 0.003	109.982	0.380E-06 0.034	25.8

## Nominal Temperature 123. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
10013	0.343	124.092	0.3470	0.04078	0.00839 0.003	119.977	0.144E-05 0.031	15.6
10014	0.343	123.471	0.3490	0.03454	0.00835 0.003	119.979	0.140E-05 0.035	16.0
10015	0.343	122.899	0.3508	0.02882	0.00834 0.003	119.979	0.139E-05 0.038	16.1
10016	0.343	122.377	0.3525	0.02363	0.00831 0.004	119.978	0.139E-05 0.042	16.3
10009	0.598	124.008	0.6283	0.04043	0.00845 0.002	119.975	0.580E-06 0.021	21.3
10010	0.598	123.423	0.6321	0.03754	0.00848 0.002	119.976	0.612E-06 0.023	20.4
10011	0.598	122.877	0.6356	0.03155	0.00845 0.003	119.976	0.594E-06 0.026	21.1
10012	0.598	122.382	0.6389	0.02612	0.00844 0.003	119.976	0.597E-06 0.032	21.0
10005	0.852	123.656	0.9346	0.04394	0.00880 0.002	119.971	0.368E-06 0.022	23.5
10006	0.852	123.118	0.9405	0.03746	0.00878 0.002	119.973	0.357E-06 0.021	24.3
10007	0.852	122.619	0.9459	0.03151	0.00874 0.002	119.973	0.348E-06 0.024	25.0
10008	0.852	122.170	0.9510	0.02609	0.00872 0.003	119.972	0.348E-06 0.029	25.0
10001	1.157	123.234	1.3511	0.04384	0.00939 0.003	119.971	0.224E-06 0.027	28.5
10002	1.157	122.752	1.3601	0.03738	0.00935 0.003	119.971	0.215E-06 0.024	29.7
10003	1.157	122.312	1.3686	0.03145	0.00931 0.003	119.970	0.207E-06 0.026	30.9
10004	1.157	121.917	1.3763	0.02604	0.00926 0.003	119.970	0.204E-06 0.029	31.3

## Nominal Temperature 133. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
11025	0.286	134.241	0.2636	0.04154	0.00913 0.003	130.142	0.284E-05 0.041	11.4
11026	0.286	133.603	0.2650	0.03496	0.00910 0.003	130.143	0.282E-05 0.042	11.5
11027	0.286	133.019	0.2663	0.02894	0.00906 0.004	130.145	0.278E-05 0.046	11.7
11028	0.286	132.492	0.2674	0.02351	0.00904 0.004	130.145	0.288E-05 0.052	11.3
11021	0.587	134.132	0.5587	0.04498	0.00910 0.002	130.135	0.896E-06 0.024	16.9

11022	0.587	133.533	0.5617	0.03811	0.00908	0.002	130.137	0.888E-06	0.025	17.1
11023	0.587	132.986	0.5645	0.03181	0.00904	0.003	130.138	0.883E-06	0.031	17.2
11024	0.587	132.485	0.5671	0.02610	0.00903	0.003	130.137	0.906E-06	0.034	16.8
11017	0.885	133.801	0.8755	0.04492	0.00933	0.002	130.134	0.492E-06	0.020	20.1
11018	0.885	133.247	0.8803	0.03806	0.00931	0.002	130.135	0.481E-06	0.022	20.7
11019	0.885	132.748	0.8847	0.03178	0.00927	0.002	130.136	0.489E-06	0.024	20.4
11020	0.885	132.291	0.8888	0.02608	0.00925	0.003	130.135	0.499E-06	0.032	20.0
11013	1.150	133.526	1.1824	0.04486	0.00964	0.002	130.127	0.327E-06	0.021	23.2
11014	1.150	133.017	1.1890	0.03802	0.00961	0.002	130.128	0.327E-06	0.021	23.3
11015	1.150	132.548	1.1953	0.03175	0.00958	0.003	130.127	0.325E-06	0.025	23.4
11016	1.150	132.131	1.2009	0.02606	0.00957	0.003	130.130	0.347E-06	0.032	22.0
11009	1.400	133.273	1.4972	0.04481	0.01004	0.002	130.124	0.243E-06	0.021	25.7
11010	1.400	132.800	1.5060	0.03798	0.01000	0.002	130.126	0.238E-06	0.022	26.3
11011	1.400	132.367	1.5142	0.03172	0.00998	0.003	130.125	0.238E-06	0.024	26.2
11012	1.400	131.976	1.5218	0.02604	0.00993	0.003	130.127	0.238E-06	0.033	26.3
11005	1.690	132.975	1.9051	0.04475	0.01073	0.003	130.124	0.184E-06	0.031	28.5
11006	1.690	132.546	1.9171	0.03792	0.01063	0.003	130.126	0.174E-06	0.025	30.0
11007	1.690	132.152	1.9283	0.03169	0.01058	0.003	130.124	0.168E-06	0.026	31.0
11008	1.690	131.797	1.9386	0.02602	0.01054	0.003	130.126	0.169E-06	0.030	30.9
11001	2.014	132.976	2.4228	0.05203	0.01159	0.005	130.129	0.111E-06	0.044	39.7
11002	2.014	132.572	2.4406	0.04466	0.01143	0.004	130.132	0.994E-07	0.033	43.9
11003	2.014	132.205	2.4572	0.03786	0.01139	0.004	130.131	0.982E-07	0.031	44.4
11004	2.014	131.894	2.4716	0.03165	0.01149	0.004	130.133	0.105E-06	0.034	41.9

#### Nominal Temperature 142. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K)	Cell Temperature K	Thermal Diffusivity m**2/s	Specific Heat J/(mol.K)		
					STAT		DSTAT			
12029	0.446	143.716	0.3873	0.04159	0.00967	0.003	140.051	0.156E-05	0.036	15.1
12030	0.446	143.126	0.3891	0.03475	0.00970	0.003	140.054	0.164E-05	0.036	14.5
12031	0.446	142.581	0.3907	0.02853	0.00968	0.003	140.052	0.164E-05	0.039	14.5
12032	0.446	142.096	0.3922	0.02294	0.00963	0.004	140.054	0.166E-05	0.047	14.3
12025	0.842	143.627	0.7575	0.04522	0.00982	0.002	140.043	0.615E-06	0.023	19.8
12026	0.842	143.068	0.7612	0.03805	0.00979	0.002	140.046	0.600E-06	0.021	20.3
12027	0.842	142.552	0.7646	0.03153	0.00981	0.002	140.046	0.624E-06	0.025	19.7
12028	0.842	142.089	0.7677	0.02563	0.00978	0.003	140.046	0.627E-06	0.033	19.6
12021	1.159	143.354	1.0792	0.04515	0.01007	0.002	140.032	0.379E-06	0.018	23.1
12022	1.159	142.833	1.0845	0.03800	0.01003	0.002	140.033	0.369E-06	0.020	23.8
12023	1.159	142.355	1.0895	0.03150	0.01003	0.002	140.034	0.376E-06	0.023	23.5
12024	1.159	141.927	1.0940	0.02561	0.01002	0.003	140.035	0.377E-06	0.032	23.4
12017	1.476	143.103	1.4256	0.04510	0.01046	0.002	140.026	0.270E-06	0.017	25.6
12018	1.476	142.627	1.4328	0.03798	0.01039	0.002	140.028	0.261E-06	0.019	26.4
12019	1.476	142.185	1.4396	0.03148	0.01039	0.002	140.027	0.261E-06	0.021	26.5
12020	1.476	141.781	1.4458	0.02559	0.01037	0.003	140.027	0.264E-06	0.030	26.2
12013	1.853	142.816	1.8800	0.04506	0.01096	0.002	140.019	0.178E-06	0.020	30.8
12014	1.853	142.373	1.8902	0.03795	0.01097	0.002	140.022	0.178E-06	0.018	30.9
12015	1.853	141.975	1.8995	0.03145	0.01096	0.002	140.022	0.179E-06	0.023	30.9
12016	1.853	141.610	1.9082	0.02558	0.01097	0.003	140.022	0.182E-06	0.032	30.5
12009	2.244	142.105	2.4296	0.03790	0.01183	0.002	140.014	0.128E-06	0.022	36.2
12010	2.244	141.748	2.4425	0.03143	0.01176	0.003	140.017	0.122E-06	0.025	37.8
12011	2.244	141.425	2.4544	0.02557	0.01176	0.004	140.018	0.123E-06	0.033	37.8
12012	2.244	141.139	2.4651	0.02032	0.01174	0.005	140.018	0.122E-06	0.046	37.9
12005	2.577	141.871	2.9680	0.03787	0.01286	0.003	140.010	0.983E-07	0.025	42.1
12006	2.577	141.549	2.9853	0.03141	0.01279	0.003	140.012	0.927E-07	0.023	44.5
12007	2.577	141.262	3.0011	0.02555	0.01276	0.003	140.014	0.923E-07	0.029	44.6
12008	2.577	141.004	3.0156	0.02031	0.01275	0.005	140.014	0.916E-07	0.043	45.0
12001	2.988	141.535	3.7984	0.03782	0.01506	0.005	140.016	0.708E-07	0.045	54.1
12002	2.988	141.278	3.8235	0.03138	0.01488	0.004	140.019	0.634E-07	0.031	59.6
12002	2.988	141.044	3.8467	0.02553	0.01476	0.004	140.019	0.602E-07	0.032	62.2
12004	2.988	140.832	3.8685	0.02029	0.01474	0.006	140.018	0.603E-07	0.045	62.0

#### Nominal Temperature 110. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K)	Cell Temperature K	Thermal Diffusivity m**2/s	Specific Heat J/(mol.K)	
					STAT		DSTAT		
115061	4.575	111.222	31.3520	0.77110	0.09912	0.001	106.779		
115060	4.570	110.813	31.4246	0.69792	0.09974	0.001	106.779		
115059	4.564	110.300	31.5153	0.62762	0.10018	0.001	106.779		

115058	4.556	109.987	31.5698	0.56244	0.10077	0.001	106.779
115057	4.549	109.667	31.6256	0.50048	0.10108	0.001	106.778
115055	7.182	111.170	31.6826	0.77064	0.10176	0.001	106.769
115054	7.179	110.731	31.7567	0.69717	0.10226	0.001	106.769
115053	7.173	110.325	31.8248	0.62748	0.10281	0.001	106.769
115052	7.168	109.969	31.8841	0.56181	0.10345	0.001	106.768
115051	7.153	109.674	31.9321	0.50044	0.10346	0.001	106.768
115056	7.186	109.658	31.9385	0.49988	0.10360	0.001	106.769
115050	10.153	111.447	31.9749	0.84746	0.10394	0.001	106.755
115049	10.148	111.011	32.0446	0.77001	0.10458	0.001	106.755
115048	10.142	110.654	32.1016	0.69724	0.10516	0.001	106.755
115047	10.129	110.215	32.1705	0.62700	0.10538	0.001	106.754
115046	10.120	109.863	32.2261	0.56109	0.10589	0.001	106.754
115045	15.000	111.330	32.4927	0.84640	0.10831	0.001	106.761
115044	14.993	110.827	32.5673	0.76886	0.10871	0.001	106.761
115043	14.986	110.531	32.6110	0.69610	0.10921	0.001	106.760
115042	14.977	110.082	32.6772	0.62655	0.10981	0.001	106.760
115041	14.969	109.737	32.7279	0.56041	0.11018	0.001	106.761
115040	21.610	111.074	33.1275	0.84467	0.11365	0.001	106.739
115039	21.604	110.711	33.1770	0.76806	0.11422	0.001	106.739
115038	21.598	110.327	33.2295	0.69502	0.11478	0.001	106.740
115037	21.590	110.010	33.2725	0.62613	0.11526	0.001	106.738
115036	21.576	109.661	33.3194	0.56070	0.11568	0.001	106.738
115034	28.686	111.058	33.6917	0.84413	0.11902	0.001	106.760
115033	28.681	110.600	33.7502	0.76660	0.11943	0.001	106.760
115032	28.671	110.252	33.7943	0.69411	0.11987	0.001	106.759
115031	28.667	109.937	33.8344	0.62504	0.12012	0.001	106.760
115035	28.695	109.581	33.8822	0.55980	0.12078	0.001	106.761
115030	35.313	111.252	34.1405	0.92363	0.12306	0.001	106.750
115029	35.312	110.870	34.1870	0.84231	0.12335	0.001	106.750
115028	35.303	110.580	34.2216	0.76653	0.12412	0.001	106.750
115027	35.301	110.179	34.2702	0.69331	0.12450	0.001	106.750
115026	35.292	109.856	34.3088	0.62425	0.12497	0.001	106.750
115025	40.858	111.168	34.5145	0.92234	0.12663	0.001	106.749
115024	40.850	110.733	34.5648	0.84167	0.12700	0.001	106.749
115023	40.857	110.448	34.5985	0.76539	0.12755	0.001	106.749
115022	40.850	110.121	34.6362	0.69313	0.12831	0.001	106.749
115021	40.850	109.903	34.6617	0.62426	0.12848	0.001	106.749
115020	47.235	111.413	34.8754	1.00606	0.13004	0.001	106.744
115019	47.226	111.060	34.9145	0.92145	0.13061	0.001	106.744
115018	47.239	110.759	34.9489	0.84137	0.13105	0.001	106.743
115017	47.241	110.427	34.9863	0.76523	0.13182	0.001	106.744
115016	47.240	109.901	35.0452	0.69146	0.13175	0.001	106.743
115015	54.358	111.352	35.2853	1.00533	0.13440	0.001	106.726
115014	54.348	110.988	35.3239	0.92104	0.13496	0.001	106.727
115013	54.344	110.809	35.3429	0.84119	0.13534	0.001	106.727
115012	54.344	110.269	35.4010	0.76355	0.13555	0.001	106.727
115011	54.331	109.965	35.4331	0.69160	0.13610	0.001	106.726
115010	60.551	111.229	35.6254	1.00404	0.13770	0.001	106.734
115009	60.548	110.935	35.6560	0.92037	0.13826	0.001	106.734
115008	60.544	110.531	35.6978	0.83983	0.13864	0.001	106.734
115007	60.543	110.162	35.7363	0.76325	0.13881	0.001	106.733
115006	60.537	109.920	35.7613	0.69117	0.13927	0.001	106.733
115005	65.932	111.189	35.8986	1.00368	0.14070	0.001	106.717
115004	65.935	110.749	35.9435	0.91912	0.14096	0.001	106.716
115003	65.935	110.455	35.9734	0.83888	0.14144	0.001	106.717
115002	65.931	110.148	36.0045	0.76291	0.14164	0.001	106.716
115001	65.931	109.807	36.0392	0.69015	0.14218	0.001	106.717

#### Nominal Temperature 125. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
116053	1.979	125.045	28.0204	0.65947	0.07800	0.001	120.546	
116051	1.963	124.467	28.1601	0.58580	0.07846	0.001	120.544	
116052	1.971	123.973	28.2829	0.51826	0.07933	0.001	120.545	
116054	1.986	123.379	28.4300	0.45416	0.07984	0.001	120.557	
116050	5.546	125.922	28.6433	0.81681	0.08190	0.001	120.551	
116049	5.543	125.351	28.7646	0.73457	0.08238	0.001	120.550	
116048	5.537	124.721	28.8966	0.65720	0.08307	0.001	120.550	

116047	5.533	124.282	28.9877	0.58441	0.08353	0.001	120.550
116046	8.010	125.626	29.1799	0.81515	0.08481	0.001	120.548
116045	8.007	125.133	29.2752	0.73397	0.08555	0.001	120.548
116044	8.003	124.635	29.3708	0.65696	0.08598	0.001	120.549
116043	7.998	124.190	29.4554	0.58426	0.08649	0.001	120.548
116042	11.355	125.686	29.7254	0.81541	0.08881	0.001	120.549
116041	11.354	125.130	29.8236	0.73356	0.08938	0.001	120.548
116040	11.351	124.725	29.8944	0.65689	0.08996	0.001	120.548
116039	11.349	124.249	29.9777	0.58442	0.09047	0.001	120.548
116038	15.124	125.573	30.2870	0.81479	0.09281	0.001	120.543
116037	15.119	125.079	30.3665	0.73369	0.09347	0.001	120.543
116036	15.112	124.506	30.4581	0.65631	0.09372	0.001	120.543
116035	15.105	124.122	30.5193	0.58453	0.09440	0.001	120.542
116034	20.130	125.908	30.8598	0.90013	0.09726	0.001	120.554
116033	20.128	125.336	30.9444	0.81385	0.09771	0.001	120.553
116032	20.123	124.775	31.0271	0.73210	0.09806	0.001	120.553
116031	20.118	124.420	31.0789	0.65556	0.09895	0.001	120.553
116030	26.891	125.734	31.6067	0.89841	0.10314	0.001	120.572
116029	26.886	125.180	31.6810	0.81316	0.10367	0.001	120.572
116028	26.882	124.747	31.7389	0.73186	0.10400	0.001	120.573
116027	26.876	124.220	31.8092	0.65515	0.10440	0.001	120.571
116025	33.308	125.912	32.1766	0.98597	0.10764	0.001	120.580
116024	33.305	125.489	32.2293	0.89679	0.10814	0.001	120.578
116023	33.297	124.907	32.3017	0.81136	0.10854	0.001	120.580
116022	33.288	124.597	32.3398	0.73014	0.10890	0.001	120.578
116026	33.313	124.145	32.3985	0.65435	0.10926	0.001	120.580
116021	39.852	125.731	32.7357	0.98537	0.11237	0.001	120.591
116020	39.848	125.241	32.7932	0.89551	0.11280	0.001	120.591
116019	39.847	125.005	32.8208	0.81149	0.11340	0.001	120.591
116018	39.844	124.308	32.9028	0.72892	0.11351	0.001	120.591
116017	47.068	125.293	33.3152	0.98246	0.11707	0.001	120.610
116016	47.072	124.897	33.3596	0.89319	0.11766	0.001	120.609
116015	47.069	124.362	33.4189	0.80866	0.11827	0.001	120.611
116014	47.052	124.002	33.4579	0.72753	0.11829	0.001	120.610
116013	54.619	124.963	33.8499	0.97993	0.12201	0.001	120.607
116012	54.628	124.693	33.8790	0.89142	0.12233	0.001	120.607
116011	54.631	124.150	33.9366	0.80753	0.12298	0.001	120.607
116010	54.638	123.861	33.9676	0.72689	0.12323	0.001	120.606
116009	61.165	124.972	34.2455	0.97943	0.12599	0.001	120.609
116008	61.168	124.538	34.2899	0.89042	0.12655	0.001	120.609
116007	61.164	124.145	34.3296	0.80625	0.12681	0.001	120.610
116006	61.167	123.693	34.3757	0.72635	0.12710	0.001	120.609
116004	67.759	125.245	34.5909	1.07098	0.12942	0.001	120.604
116003	67.765	124.813	34.6336	0.97774	0.12984	0.001	120.604
116002	67.767	124.417	34.6726	0.88909	0.13032	0.001	120.605
116001	67.772	124.078	34.7061	0.80558	0.13091	0.001	120.604
116005	67.746	123.980	34.7143	0.80399	0.13050	0.001	120.605

#### Nominal Temperature 139. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
114086	2.566	139.839	23.1215	0.59518	0.05794	0.003	135.007	
114085	2.558	139.224	23.4590	0.52346	0.05899	0.004	135.007	
114081	3.083	139.952	23.5540	0.59736	0.05908	0.004	135.015	
114084	2.558	138.685	23.7372	0.45525	0.05928	0.004	135.007	
114080	3.082	139.370	23.8321	0.52388	0.05949	0.004	135.013	
114083	2.558	138.129	24.0059	0.39178	0.05976	0.005	135.006	
114079	3.080	138.692	24.1357	0.45525	0.06000	0.004	135.015	
114082	2.558	137.747	24.1814	0.33360	0.06031	0.006	135.007	
114076	3.685	139.298	24.2874	0.52379	0.06090	0.003	135.025	
114078	3.080	138.213	24.3394	0.39202	0.06075	0.005	135.015	
114072	4.273	139.820	24.4445	0.59718	0.06227	0.003	135.019	
114075	3.681	138.711	24.5164	0.45541	0.06175	0.004	135.025	
114077	3.078	137.754	24.5263	0.33371	0.06114	0.006	135.015	
114071	4.272	139.214	24.6674	0.52375	0.06284	0.003	135.019	
114074	3.679	138.128	24.7360	0.39190	0.06245	0.005	135.025	
114070	4.268	138.695	24.8506	0.45534	0.06360	0.004	135.019	
114073	3.675	137.730	24.8806	0.33355	0.06264	0.006	135.026	
114069	4.264	138.264	24.9982	0.39215	0.06396	0.004	135.019	

114068	5.821	139.740	25.2472	0.59685	0.06555	0.002	135.021
114068	5.821	139.167	25.4204	0.52359	0.06590	0.003	135.018
114066	5.820	138.562	25.5988	0.45512	0.06637	0.003	135.018
114065	5.820	138.109	25.7299	0.39185	0.06675	0.004	135.018

Nominal Temperature 140. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
114163	3.011	140.381	23.2692	0.52913	0.05805	0.004	136.163	
114162	3.010	139.887	23.5236	0.46028	0.05860	0.004	136.163	
114161	3.007	139.338	23.7882	0.39617	0.05910	0.005	136.162	
114160	3.004	138.944	23.9681	0.33721	0.05970	0.006	136.162	
114159	3.847	139.882	24.1563	0.46022	0.06076	0.004	136.168	
114158	3.845	139.211	24.4213	0.39594	0.06156	0.004	136.167	
114157	3.841	138.795	24.5789	0.33690	0.06195	0.006	136.168	
114156	4.969	140.324	24.6497	0.52896	0.06224	0.003	136.171	
114155	4.967	139.852	24.8107	0.46002	0.06319	0.004	136.170	
114152	5.782	140.947	24.8506	0.60313	0.06341	0.004	136.160	
114154	4.965	139.323	24.9870	0.39601	0.06369	0.004	136.171	
114151	5.776	140.375	25.0301	0.52886	0.06353	0.003	136.159	
114150	5.772	139.899	25.1770	0.45980	0.06433	0.004	136.160	
114153	4.962	138.644	25.2066	0.33692	0.06434	0.006	136.170	
114149	5.766	139.302	25.3567	0.39577	0.06478	0.004	136.160	
114148	7.842	140.879	25.7185	0.60280	0.06726	0.002	136.183	
114147	7.842	140.256	25.8820	0.52862	0.06765	0.003	136.183	
114146	7.839	139.607	26.0482	0.45941	0.06828	0.004	136.184	
114145	7.836	139.213	26.1478	0.39575	0.06895	0.003	136.185	
114144	10.036	140.788	26.4401	0.60238	0.07075	0.002	136.203	
114143	10.031	140.265	26.5582	0.52845	0.07130	0.002	136.203	
114142	10.028	139.667	26.6920	0.45936	0.07170	0.003	136.203	
114141	10.024	139.224	26.7901	0.39493	0.07205	0.003	136.203	
114140	12.197	141.364	26.8898	0.68014	0.07327	0.002	136.212	
114139	12.194	140.726	27.0211	0.60124	0.07360	0.002	136.212	
114138	12.190	140.078	27.1530	0.52722	0.07400	0.002	136.212	
114137	12.189	139.676	27.2348	0.45864	0.07467	0.002	136.212	
114136	14.922	141.154	27.5487	0.67964	0.07688	0.002	136.211	
114135	14.918	140.524	27.6650	0.60055	0.07721	0.002	136.212	
114134	14.916	140.022	27.7573	0.52694	0.07753	0.002	136.211	
114133	14.912	139.522	27.8487	0.45825	0.07803	0.001	136.213	
114132	17.827	141.026	28.1314	0.67914	0.08057	0.001	136.212	
114131	17.827	140.462	28.2274	0.60035	0.08092	0.001	136.213	
114130	17.825	139.993	28.3065	0.52672	0.08115	0.001	136.212	
114129	17.822	139.575	28.3768	0.45824	0.08158	0.001	136.212	
114128	21.494	140.803	28.7749	0.67830	0.08425	0.001	136.215	
114127	21.486	140.353	28.8437	0.59989	0.08472	0.001	136.214	
114126	21.485	139.751	28.9372	0.52625	0.08513	0.001	136.215	
114125	21.484	139.259	29.0132	0.45744	0.08532	0.001	136.215	
114124	24.780	140.595	29.2817	0.67775	0.08752	0.001	136.215	
114123	24.777	140.183	29.3414	0.59956	0.08783	0.001	136.216	
114122	24.767	139.599	29.4250	0.52579	0.08808	0.001	136.212	
114121	24.755	139.191	29.4828	0.45730	0.08828	0.002	136.212	
114120	28.176	141.048	29.6604	0.76120	0.09026	0.001	136.212	
114119	28.177	140.484	29.7382	0.67742	0.09068	0.001	136.212	
114118	28.170	140.019	29.8013	0.59910	0.09087	0.001	136.206	
114117	28.168	139.692	29.8460	0.52666	0.09159	0.001	136.207	
114116	34.980	141.296	30.4070	0.85010	0.09552	0.001	136.256	
114115	34.975	140.861	30.4609	0.76158	0.09593	0.001	136.256	
114114	34.973	140.343	30.5257	0.67798	0.09624	0.001	136.256	
114113	34.965	139.922	30.5776	0.59955	0.09654	0.001	136.256	
114112	34.958	139.403	30.6418	0.52584	0.09681	0.001	136.256	
114111	40.120	141.719	30.8713	0.94316	0.09928	0.001	136.250	
114110	40.118	141.183	30.9345	0.84944	0.09968	0.001	136.250	
114109	40.118	140.734	30.9876	0.76060	0.09996	0.001	136.249	
114108	40.115	140.208	31.0494	0.67712	0.10040	0.001	136.250	
114107	40.103	139.735	31.1042	0.59856	0.10068	0.001	136.248	
114106	46.934	141.525	31.5041	0.94145	0.10430	0.001	136.253	
114105	46.937	141.034	31.5586	0.84861	0.10489	0.001	136.253	
114104	46.939	140.449	31.6236	0.75952	0.10498	0.001	136.253	
114103	46.939	140.022	31.6708	0.67642	0.10553	0.001	136.253	

114102	46.940	139.774	31.6984	0.59770	0.10552	0.001	136.253
114101	52.998	141.350	32.0097	0.94077	0.10860	0.001	136.257
114100	52.999	140.784	32.0694	0.84730	0.10907	0.001	136.257
114099	52.995	140.435	32.1058	0.75882	0.10920	0.001	136.256
114098	52.992	139.869	32.1653	0.67600	0.10950	0.001	136.257
114097	52.995	139.567	32.1973	0.59757	0.10997	0.001	136.256
114096	59.782	141.242	32.5161	0.93921	0.11324	0.001	136.254
114095	59.771	140.656	32.5740	0.84551	0.11350	0.001	136.253
114094	59.776	140.400	32.6001	0.75796	0.11385	0.001	136.253
114093	59.771	139.773	32.6627	0.67465	0.11415	0.001	136.253
114092	59.773	139.289	32.7114	0.59630	0.11431	0.001	136.253
114091	66.402	140.628	33.0178	0.84539	0.11748	0.001	136.260
114090	66.404	140.060	33.0726	0.75741	0.11780	0.001	136.259
114089	66.398	139.637	33.1129	0.67474	0.11845	0.001	136.259
114088	66.401	139.251	33.1504	0.59667	0.11858	0.001	136.259
114087	66.402	138.882	33.1860	0.52408	0.11899	0.002	136.260

### Nominal Temperature 157. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K)	Cell Temperature K	Thermal Diffusivity m**2/s	Specific Heat J/(mol.K)		
					STAT		DSTAT			
13160	1.224	159.142	1.0003	0.03600	0.01075	0.003	156.799	0.412E-06	0.033	25.2
13159	1.225	158.918	1.0024	0.03256	0.01074	0.003	156.799	0.410E-06	0.034	25.3
13158	1.225	158.704	1.0044	0.02929	0.01070	0.004	156.798	0.400E-06	0.039	25.8
13157	1.225	158.529	1.0058	0.02620	0.01069	0.004	156.794	0.480E-06	0.045	21.5
13156	1.732	158.957	1.4705	0.03597	0.01121	0.003	156.791	0.303E-06	0.028	24.3
13155	1.732	158.749	1.4733	0.03254	0.01120	0.004	156.793	0.301E-06	0.043	24.4
13154	1.732	158.559	1.4757	0.02928	0.01118	0.005	156.791	0.307E-06	0.047	24.0
13153	1.732	158.366	1.4783	0.02619	0.01114	0.005	156.790	0.302E-06	0.051	24.3
13152	2.336	158.918	2.0839	0.03957	0.01191	0.002	156.789	0.199E-06	0.020	27.7
13151	2.336	158.723	2.0880	0.03596	0.01190	0.002	156.789	0.201E-06	0.021	27.4
13150	2.337	158.540	2.0928	0.03251	0.01188	0.003	156.790	0.201E-06	0.025	27.4
13148	2.650	158.791	2.4342	0.03952	0.01234	0.002	156.779	0.170E-06	0.022	28.7
13147	2.650	158.602	2.4398	0.03592	0.01233	0.003	156.779	0.169E-06	0.025	29.0
13146	2.650	158.426	2.4446	0.03249	0.01232	0.003	156.778	0.167E-06	0.028	29.3
13145	2.650	158.263	2.4491	0.02923	0.01230	0.003	156.778	0.164E-06	0.032	29.8
13144	3.060	158.788	2.9257	0.04328	0.01302	0.002	156.776	0.125E-06	0.020	34.4
13143	3.060	158.613	2.9323	0.03952	0.01304	0.002	156.776	0.130E-06	0.021	33.2
13142	3.060	158.446	2.9385	0.03590	0.01299	0.003	156.776	0.129E-06	0.024	33.3
13141	3.060	158.284	2.9451	0.03247	0.01306	0.003	156.776	0.133E-06	0.027	32.4
13140	3.385	158.635	3.3583	0.04325	0.01368	0.002	156.762	0.107E-06	0.019	36.9
13139	3.385	158.469	3.3663	0.03948	0.01367	0.002	156.761	0.108E-06	0.021	36.6
13138	3.385	158.312	3.3738	0.03588	0.01367	0.003	156.760	0.109E-06	0.024	36.4
13137	3.385	158.165	3.3810	0.03246	0.01358	0.003	156.759	0.108E-06	0.027	36.5
13136	3.825	158.433	4.0157	0.04322	0.01476	0.002	156.760	0.836E-07	0.020	43.0
13135	3.825	158.286	4.0257	0.03946	0.01475	0.003	156.761	0.844E-07	0.022	42.5
13134	3.825	158.143	4.0355	0.03587	0.01480	0.003	156.759	0.865E-07	0.023	41.6
13133	3.825	158.012	4.0446	0.03245	0.01477	0.003	156.758	0.876E-07	0.027	41.0
13132	4.153	158.397	4.5657	0.04714	0.01580	0.002	156.747	0.669E-07	0.018	50.9
13131	4.153	158.257	4.5783	0.04321	0.01579	0.003	156.747	0.654E-07	0.022	51.9
13130	4.153	158.122	4.5907	0.03945	0.01584	0.003	156.748	0.673E-07	0.022	50.5
13129	4.153	158.000	4.6019	0.03586	0.01583	0.003	156.745	0.683E-07	0.026	49.7
13128	4.520	158.177	5.2955	0.04712	0.01731	0.003	156.739	0.502E-07	0.021	64.8
13127	4.520	158.061	5.3105	0.04319	0.01736	0.003	156.739	0.520E-07	0.022	62.6
13126	4.519	157.948	5.3236	0.03943	0.01736	0.003	156.740	0.522E-07	0.026	62.2
13125	4.519	157.840	5.3378	0.03585	0.01739	0.004	156.737	0.538E-07	0.030	60.4
13121	4.926	157.964	6.2944	0.04710	0.01974	0.003	156.743	0.386E-07	0.022	81.8
13122	4.926	157.865	6.3147	0.04318	0.01974	0.003	156.745	0.392E-07	0.025	80.4
13123	4.927	157.761	6.3374	0.03942	0.01979	0.004	156.745	0.403E-07	0.027	78.2
13124	4.927	157.668	6.3570	0.03582	0.01985	0.004	156.745	0.412E-07	0.031	76.3
13117	5.174	157.777	7.0772	0.04317	0.02171	0.004	156.810	0.290E-07	0.026	107.6
13118	5.174	157.692	7.1021	0.03941	0.02177	0.004	156.812	0.290E-07	0.031	107.4
13119	5.174	157.603	7.1285	0.03581	0.02179	0.005	156.813	0.294E-07	0.034	105.5
13120	5.174	157.534	7.1496	0.03240	0.02181	0.005	156.813	0.297E-07	0.037	103.9
13113	5.379	157.644	7.8736	0.04315	0.02409	0.004	156.811	0.222E-07	0.027	140.9
13115	5.379	157.497	7.9353	0.03580	0.02418	0.005	156.813	0.218E-07	0.035	142.1
13116	5.379	157.425	7.9663	0.03239	0.02420	0.006	156.812	0.230E-07	0.040	134.0
13109	5.550	157.527	8.7078	0.04314	0.02679	0.004	156.818	0.176E-07	0.029	178.2
13110	5.550	157.472	8.7394	0.03938	0.02685	0.005	156.818	0.182E-07	0.034	172.5
13111	5.550	157.405	8.7796	0.03579	0.02689	0.006	156.819	0.181E-07	0.040	172.8

13112	5.550	157.347	8.8145	0.03238	0.02694	0.006	156.820	0.185E-07	0.045	168.3
13105	5.687	157.438	9.5259	0.04312	0.02978	0.005	156.822	0.149E-07	0.034	213.4
13106	5.687	157.382	9.5697	0.03937	0.02980	0.006	156.827	0.151E-07	0.038	209.3
13107	5.687	157.331	9.6106	0.03578	0.02988	0.006	156.826	0.160E-07	0.039	198.2
13108	5.687	157.281	9.6516	0.03238	0.02975	0.007	156.824	0.152E-07	0.046	205.4
13101	5.741	157.389	9.9128	0.04313	0.03117	0.005	156.814	0.126E-07	0.033	253.9
13102	5.741	157.332	9.9638	0.03937	0.03123	0.005	156.816	0.129E-07	0.036	245.8
13103	5.741	157.274	10.0171	0.03579	0.03115	0.007	156.815	0.127E-07	0.043	247.1
13104	5.741	157.244	10.0453	0.03230	0.03140	0.008	156.815	0.133E-07	0.051	237.8
13097	5.817	157.335	10.4954	0.04313	0.03320	0.005	156.811	0.112E-07	0.032	286.8
13098	5.817	157.289	10.5446	0.03937	0.03328	0.006	156.812	0.114E-07	0.038	280.8
13099	5.817	157.228	10.6106	0.03578	0.03327	0.006	156.813	0.114E-07	0.042	278.3
13100	5.817	157.198	10.6450	0.03237	0.03351	0.007	156.814	0.119E-07	0.048	266.3
13093	5.871	157.282	10.9695	0.04312	0.03491	0.005	156.806	0.104E-07	0.034	309.1
13094	5.871	157.254	11.0037	0.03937	0.03479	0.006	156.807	0.107E-07	0.038	297.6
13095	5.871	157.211	11.0565	0.03578	0.03511	0.007	156.809	0.110E-07	0.042	289.9
13096	5.871	157.159	11.1219	0.03237	0.03515	0.008	156.809	0.125E-07	0.050	253.0
13089	5.950	157.260	11.6526	0.04312	0.03701	0.005	156.813	0.101E-07	0.034	313.8
13090	5.950	157.215	11.7152	0.03936	0.03698	0.006	156.816	0.104E-07	0.039	304.2
13091	5.950	157.173	11.7742	0.03577	0.03725	0.007	156.817	0.106E-07	0.048	299.2
13092	5.950	157.132	11.8333	0.03236	0.03736	0.008	156.816	0.124E-07	0.052	254.4
13085	6.011	157.271	12.1542	0.04704	0.03847	0.006	156.825	0.802E-08	0.035	393.3
13086	6.011	157.262	12.1678	0.04310	0.03860	0.006	156.827	0.120E-07	0.040	263.9
13087	6.011	157.227	12.2199	0.03936	0.03850	0.007	156.829	0.122E-07	0.043	258.5
13088	6.011	157.186	12.2831	0.03578	0.03878	0.007	156.829	0.118E-07	0.048	267.8
13082	6.146	157.335	13.2258	0.04705	0.04039	0.006	156.892	0.926E-08	0.036	327.0
13083	6.146	157.315	13.2590	0.04546	0.04024	0.006	156.890	0.911E-08	0.037	330.4
13084	6.146	157.286	13.3060	0.04160	0.04039	0.007	156.891	0.915E-08	0.043	329.2
13081	6.146	157.286	13.3064	0.04312	0.04034	0.006	156.888	0.935E-08	0.040	321.6
13079	6.300	157.428	14.3127	0.05542	0.04168	0.005	156.907	0.985E-08	0.029	291.7
13080	6.300	157.417	14.3256	0.05370	0.04160	0.005	156.908	0.990E-08	0.032	289.4
13078	6.301	157.390	14.3790	0.05115	0.04162	0.005	156.909	0.996E-08	0.030	286.8
13077	6.302	157.356	14.4382	0.04706	0.04152	0.006	156.908	0.103E-07	0.037	275.4
13074	6.496	157.448	15.5882	0.06444	0.04247	0.004	156.795	0.147E-07	0.026	181.9
13075	6.496	157.393	15.6651	0.05982	0.04236	0.004	156.797	0.148E-07	0.028	180.2
13073	6.496	157.352	15.7231	0.05533	0.04233	0.005	156.794	0.148E-07	0.031	179.5
13076	6.496	157.314	15.7761	0.05113	0.04232	0.005	156.798	0.153E-07	0.036	172.6
13069	6.785	157.733	16.6486	0.08995	0.04299	0.003	156.812	0.163E-07	0.019	156.1
13070	6.785	157.625	16.7691	0.07920	0.04295	0.003	156.814	0.165E-07	0.021	153.2
13071	6.785	157.521	16.8843	0.06914	0.04294	0.003	156.813	0.169E-07	0.024	148.7
13072	6.785	157.426	16.9881	0.05975	0.04295	0.004	156.812	0.174E-07	0.028	143.9
13065	7.172	157.864	17.8297	0.10143	0.04391	0.002	156.814	0.195E-07	0.015	125.0
13066	7.172	157.747	17.9290	0.08997	0.04393	0.002	156.818	0.198E-07	0.016	122.4
13067	7.172	157.642	18.0163	0.07920	0.04403	0.003	156.818	0.208E-07	0.019	116.4
13068	7.172	157.536	18.1038	0.06915	0.04403	0.003	156.818	0.210E-07	0.021	114.8
13061	7.664	158.245	18.6894	0.13984	0.04503	0.002	156.820	0.195E-07	0.013	122.5
13062	7.665	158.107	18.7829	0.12637	0.04511	0.002	156.822	0.198E-07	0.012	120.4
13063	7.665	157.969	18.8753	0.11354	0.04516	0.002	156.822	0.194E-07	0.013	122.6
13064	7.665	157.844	18.9574	0.10138	0.04516	0.002	156.822	0.197E-07	0.014	120.1
13057	8.397	158.704	19.6299	0.18460	0.04662	0.002	156.831	0.232E-07	0.012	101.4
13058	8.399	158.543	19.7168	0.16899	0.04670	0.001	156.831	0.235E-07	0.010	100.0
13059	8.401	158.385	19.8007	0.15407	0.04677	0.001	156.834	0.231E-07	0.009	101.5
13060	8.402	158.240	19.8770	0.13987	0.04684	0.001	156.834	0.233E-07	0.010	100.8
13053	9.400	159.018	20.6482	0.21791	0.04872	0.001	156.841	0.276E-07	0.010	85.2
13054	9.402	158.845	20.7211	0.20099	0.04886	0.001	156.843	0.279E-07	0.008	84.2
13055	9.404	158.682	20.7900	0.18468	0.04895	0.001	156.844	0.280E-07	0.008	83.9
13056	9.409	158.518	20.8613	0.16901	0.04907	0.001	156.845	0.278E-07	0.008	84.4
13049	10.405	159.151	21.4584	0.23555	0.05059	0.001	156.846	0.304E-07	0.006	77.5
13050	10.405	158.972	21.5212	0.21799	0.05081	0.001	156.848	0.310E-07	0.006	76.2
13051	10.405	158.801	21.5803	0.20096	0.05095	0.001	156.850	0.311E-07	0.007	76.0
13052	10.405	158.639	21.6367	0.18462	0.05105	0.001	156.850	0.318E-07	0.008	74.4
13045	11.792	159.562	22.2471	0.28291	0.05277	0.001	156.862	0.339E-07	0.006	70.3
13046	11.793	159.103	22.3836	0.23557	0.05327	0.001	156.863	0.355E-07	0.006	67.4
13047	11.794	158.685	22.5067	0.19262	0.05340	0.001	156.863	0.353E-07	0.007	67.4
13048	11.795	158.314	22.6149	0.15405	0.05387	0.001	156.864	0.369E-07	0.009	64.8
13042	13.555	159.480	23.1758	0.28296	0.05592	0.001	156.873	0.388E-07	0.005	62.6
13043	13.557	159.036	23.2892	0.23559	0.05628	0.001	156.874	0.403E-07	0.006	60.4
13044	13.558	158.637	23.3900	0.19263	0.05656	0.001	156.874	0.414E-07	0.008	58.8
13197	15.711	159.580	24.0203	0.31376	0.05889	0.001	156.802	0.429E-07	0.007	57.7
13198	15.713	159.134	24.1191	0.26371	0.05929	0.001	156.803	0.446E-07	0.009	55.6
13199	15.715	158.722	24.2101	0.21805	0.05965	0.001	156.803	0.459E-07	0.012	54.2
13200	15.716	158.351	24.2915	0.17680	0.06009	0.002	156.804	0.476E-07	0.016	52.3

13193	18.406	159.650	24.8723	0.33483	0.06238	0.001	156.808	0.475E-07	0.007	53.5
13194	18.407	159.199	24.9600	0.28305	0.06279	0.001	156.809	0.483E-07	0.009	52.7
13195	18.409	158.794	25.0386	0.23563	0.06321	0.001	156.810	0.502E-07	0.011	50.7
13196	18.411	158.424	25.1105	0.19267	0.06348	0.002	156.811	0.515E-07	0.015	49.4
13189	20.799	159.552	25.5281	0.33478	0.06534	0.001	156.809	0.507E-07	0.007	51.1
13190	20.802	159.118	25.6056	0.28300	0.06573	0.001	156.811	0.520E-07	0.010	49.8
13191	20.805	158.728	25.6749	0.23562	0.06618	0.001	156.812	0.541E-07	0.012	48.1
13192	20.807	158.377	25.7371	0.19266	0.06658	0.002	156.811	0.576E-07	0.015	45.2
13185	24.075	159.688	26.2446	0.36764	0.06900	0.001	156.805	0.548E-07	0.006	48.5
13186	24.079	159.253	26.3151	0.31329	0.06919	0.001	156.809	0.549E-07	0.008	48.4
13187	24.083	158.857	26.3792	0.26334	0.06950	0.001	156.809	0.568E-07	0.011	46.8
13188	24.088	158.501	26.4370	0.21781	0.07003	0.002	156.809	0.605E-07	0.014	44.1
13181	29.716	159.671	27.2847	0.39047	0.07455	0.001	156.796	0.604E-07	0.006	45.8
13182	29.724	159.254	27.3447	0.33437	0.07495	0.001	156.799	0.619E-07	0.006	44.7
13183	29.728	158.869	27.3995	0.28265	0.07529	0.001	156.799	0.639E-07	0.007	43.4
13184	29.730	158.516	27.4494	0.23534	0.07555	0.001	156.802	0.655E-07	0.009	42.3
13177	35.744	159.757	28.1709	0.42602	0.07973	0.001	156.804	0.644E-07	0.004	44.4
13178	35.750	159.340	28.2246	0.36722	0.08020	0.001	156.805	0.662E-07	0.005	43.3
13179	35.754	158.959	28.2733	0.31289	0.08053	0.001	156.806	0.682E-07	0.006	42.1
13180	35.759	158.609	28.3183	0.26300	0.08089	0.001	156.806	0.696E-07	0.008	41.3
13173	42.567	159.591	29.0376	0.42580	0.08541	0.001	156.806	0.694E-07	0.006	42.8
13174	42.575	159.192	29.0845	0.36710	0.08593	0.001	156.810	0.706E-07	0.005	42.2
13175	42.582	158.832	29.1269	0.31282	0.08619	0.001	156.810	0.709E-07	0.007	42.0
13176	42.587	158.507	29.1649	0.26296	0.08657	0.001	156.809	0.728E-07	0.009	41.0
13169	49.450	159.443	29.7823	0.42559	0.09071	0.001	156.812	0.726E-07	0.005	42.3
13170	49.460	159.073	29.8230	0.36687	0.09119	0.001	156.817	0.746E-07	0.006	41.3
13171	49.470	158.736	29.8600	0.31272	0.09165	0.001	156.815	0.761E-07	0.007	40.6
13172	49.477	158.425	29.8941	0.26293	0.09183	0.001	156.815	0.769E-07	0.009	40.2
13165	57.000	159.708	30.4520	0.48839	0.09609	0.000	156.809	0.803E-07	0.004	39.7
13166	57.006	159.325	30.4909	0.42530	0.09637	0.001	156.831	0.816E-07	0.005	39.0
13167	57.005	158.968	30.5265	0.36667	0.09669	0.001	156.810	0.824E-07	0.006	38.7
13168	57.004	158.646	30.5587	0.31251	0.09690	0.001	156.810	0.830E-07	0.007	38.4
13161	67.582	159.500	31.3192	0.48798	0.10306	0.001	156.798	0.831E-07	0.005	39.9
13162	67.585	159.137	31.3529	0.42499	0.10338	0.001	156.799	0.823E-07	0.005	40.3
13163	67.593	158.809	31.3839	0.36648	0.10350	0.001	156.795	0.831E-07	0.006	39.9
13164	67.597	158.503	31.4126	0.31239	0.10375	0.001	156.797	0.840E-07	0.008	39.5

#### Nominal Temperature 173. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K)	Cell Temperature K	Thermal Diffusivity m**2/s	Specific Heat DSTAT J/(mol.K)		
5199	0.293	174.375	0.2045	0.03728	0.01212	0.003	171.400	0.633E-05	0.043	9.0
5198	0.293	174.068	0.2049	0.03354	0.01214	0.004	171.400	0.614E-05	0.048	9.4
5197	0.293	173.763	0.2053	0.03000	0.01210	0.004	171.400	0.541E-05	0.056	10.6
5196	0.293	173.482	0.2056	0.02679	0.01221	0.005	171.400	0.516E-05	0.066	11.2
5195	0.500	174.493	0.3525	0.04137	0.01195	0.003	171.388	0.260E-05	0.039	12.6
5194	0.500	174.198	0.3531	0.03743	0.01193	0.003	171.388	0.256E-05	0.040	12.7
5193	0.500	173.890	0.3541	0.03353	0.01192	0.003	171.387	0.236E-05	0.040	13.9
5192	0.500	173.647	0.3546	0.03000	0.01193	0.003	171.388	0.266E-05	0.040	12.3
5191	0.974	174.449	0.7027	0.04533	0.01174	0.002	171.382	0.822E-06	0.023	19.6
5190	0.975	174.161	0.7044	0.04120	0.01171	0.002	171.383	0.773E-06	0.023	20.8
5189	0.975	173.885	0.7056	0.03725	0.01172	0.002	171.383	0.750E-06	0.024	21.5
5188	0.975	173.628	0.7068	0.03352	0.01176	0.002	171.382	0.762E-06	0.025	21.2
5187	1.352	174.247	0.9952	0.04529	0.01185	0.002	171.392	0.490E-06	0.020	23.4
5186	1.352	173.983	0.9973	0.04116	0.01184	0.002	171.392	0.484E-06	0.022	23.7
5185	1.352	173.749	0.9990	0.03747	0.01174	0.002	171.393	0.440E-06	0.018	25.9
5184	1.352	173.496	1.0007	0.03349	0.01183	0.002	171.393	0.472E-06	0.022	24.4
5183	1.933	174.208	1.4675	0.04959	0.01226	0.002	171.391	0.271E-06	0.015	29.7
5182	1.933	173.981	1.4700	0.04526	0.01223	0.002	171.391	0.282E-06	0.016	28.5
5181	1.933	173.753	1.4726	0.04114	0.01227	0.002	171.391	0.300E-06	0.021	26.9
5180	1.933	173.548	1.4749	0.03747	0.01221	0.002	171.391	0.294E-06	0.019	27.3
5179	2.606	174.256	2.0538	0.05408	0.01288	0.001	171.396	0.223E-06	0.012	27.0
5178	2.606	174.016	2.0580	0.04957	0.01285	0.002	171.394	0.219E-06	0.015	27.5
5177	2.607	173.788	2.0624	0.04524	0.01283	0.001	171.397	0.215E-06	0.014	27.9
5176	2.607	173.528	2.0670	0.04113	0.01283	0.002	171.395	0.197E-06	0.019	30.5
5175	3.091	174.249	2.5080	0.05879	0.01334	0.001	171.393	0.158E-06	0.011	32.4
5174	3.091	174.034	2.5131	0.05409	0.01336	0.001	171.392	0.172E-06	0.013	29.8
5173	3.091	173.793	2.5188	0.04955	0.01333	0.001	171.392	0.157E-06	0.012	32.5
5172	3.092	173.582	2.5241	0.04526	0.01335	0.001	171.392	0.158E-06	0.013	32.5
5171	3.573	174.038	2.9954	0.05880	0.01399	0.001	171.387	0.130E-06	0.012	34.6

5170	3.573	173.828	3.0019	0.05409	0.01395	0.001	171.387	0.128E-06	0.010	35.1
5169	3.573	173.651	3.0074	0.04957	0.01399	0.001	171.388	0.137E-06	0.010	32.9
5168	3.573	173.440	3.0140	0.04529	0.01397	0.001	171.386	0.128E-06	0.011	35.1
5167	4.008	174.100	3.4589	0.06373	0.01462	0.001	171.405	0.115E-06	0.013	35.5
5166	4.008	173.881	3.4674	0.05876	0.01461	0.001	171.405	0.110E-06	0.013	36.9
5165	4.008	173.719	3.4738	0.05405	0.01464	0.001	171.405	0.118E-06	0.013	34.6
5164	4.008	173.523	3.4815	0.04954	0.01461	0.001	171.426	0.106E-06	0.013	38.6
5163	4.453	173.885	3.9792	0.06367	0.01538	0.002	171.407	0.893E-07	0.014	42.0
5162	4.453	173.687	3.9891	0.05875	0.01538	0.002	171.407	0.849E-07	0.013	44.2
5161	4.453	173.516	3.9976	0.05403	0.01536	0.001	171.408	0.876E-07	0.012	42.7
5160	4.453	173.324	4.0074	0.04951	0.01535	0.001	171.407	0.847E-07	0.013	44.2
5159	4.799	173.761	4.4131	0.06363	0.01604	0.002	171.400	0.859E-07	0.016	41.2
5158	4.799	173.573	4.4244	0.05872	0.01602	0.001	171.401	0.828E-07	0.012	42.7
5157	4.799	173.391	4.4354	0.05401	0.01602	0.001	171.401	0.804E-07	0.013	43.9
5156	4.800	173.215	4.4466	0.04951	0.01608	0.002	171.401	0.735E-07	0.013	48.2
5155	5.081	173.824	4.7764	0.06872	0.01665	0.002	171.396	0.797E-07	0.015	42.7
5154	5.082	173.617	4.7913	0.06361	0.01661	0.002	171.397	0.716E-07	0.013	47.4
5153	5.082	173.453	4.8028	0.05870	0.01663	0.002	171.398	0.739E-07	0.014	45.9
5152	5.082	173.283	4.8154	0.05399	0.01664	0.002	171.398	0.726E-07	0.013	46.7
5151	5.437	173.637	5.2845	0.06870	0.01752	0.002	171.399	0.639E-07	0.016	50.9
5150	5.438	173.468	5.2994	0.06360	0.01750	0.002	171.398	0.621E-07	0.015	52.3
5149	5.438	173.285	5.3156	0.05868	0.01750	0.002	171.398	0.572E-07	0.015	56.8
5148	5.438	173.120	5.3305	0.05398	0.01751	0.002	171.399	0.540E-07	0.015	60.0
5147	5.440	172.967	5.3465	0.04947	0.01742	0.002	171.398	0.498E-07	0.015	64.7
5146	5.744	173.460	5.7575	0.06866	0.01837	0.002	171.400	0.495E-07	0.017	63.7
5145	5.744	173.311	5.7732	0.06357	0.01838	0.002	171.402	0.498E-07	0.014	63.2
5144	5.745	173.154	5.7898	0.05866	0.01833	0.002	171.399	0.476E-07	0.014	65.9
5143	5.745	173.007	5.8056	0.05397	0.01840	0.002	171.399	0.474E-07	0.014	66.3
5142	5.746	172.868	5.8218	0.04947	0.01829	0.002	171.400	0.442E-07	0.014	70.6
5141	5.748	172.724	5.8403	0.04516	0.01836	0.002	171.399	0.423E-07	0.015	73.8
5140	5.982	173.067	6.1805	0.05867	0.01899	0.002	171.396	0.473E-07	0.016	64.6
5139	5.983	172.928	6.1975	0.05397	0.01900	0.002	171.398	0.462E-07	0.016	66.0
5138	5.984	172.801	6.2152	0.04947	0.01900	0.002	171.397	0.451E-07	0.015	67.4
5137	5.985	172.666	6.2326	0.04516	0.01905	0.002	171.398	0.427E-07	0.017	71.3
5136	6.199	173.119	6.5400	0.06355	0.01974	0.002	171.394	0.444E-07	0.017	67.6
5135	6.199	172.991	6.5577	0.05865	0.01972	0.002	171.393	0.453E-07	0.018	66.2
5134	6.200	172.840	6.5794	0.05395	0.01970	0.002	171.392	0.407E-07	0.017	73.3
5133	6.201	172.725	6.5962	0.04945	0.01970	0.002	171.393	0.419E-07	0.015	71.1
5132	6.202	172.600	6.6147	0.04515	0.01977	0.002	171.393	0.393E-07	0.016	75.9
5131	6.472	173.046	7.0369	0.06353	0.02076	0.002	171.395	0.451E-07	0.019	65.3
5130	6.472	172.905	7.0604	0.05864	0.02072	0.002	171.395	0.419E-07	0.017	70.0
5129	6.472	172.778	7.0804	0.05394	0.02072	0.002	171.397	0.406E-07	0.019	72.1
5128	6.473	172.657	7.1006	0.04944	0.02075	0.002	171.398	0.395E-07	0.017	74.0
5127	6.474	172.540	7.1214	0.04513	0.02074	0.002	171.397	0.376E-07	0.019	77.4
5126	6.741	172.798	7.5948	0.05863	0.02182	0.002	171.387	0.380E-07	0.017	75.7
5125	6.742	172.670	7.6201	0.05392	0.02182	0.002	171.385	0.355E-07	0.019	80.7
5124	6.742	172.556	7.6424	0.04943	0.02185	0.002	171.384	0.344E-07	0.016	83.2
5123	6.743	172.450	7.6640	0.04515	0.02183	0.002	171.387	0.328E-07	0.017	87.1
5122	6.943	172.574	8.0527	0.05394	0.02275	0.002	171.385	0.282E-07	0.018	100.3
5121	6.944	172.465	8.0773	0.04944	0.02280	0.002	171.386	0.267E-07	0.018	106.1
5120	6.944	172.355	8.1026	0.04514	0.02274	0.003	171.385	0.242E-07	0.020	116.1
5119	6.945	172.270	8.1224	0.04104	0.02274	0.003	171.397	0.227E-07	0.020	123.4
5118	7.213	172.606	8.6313	0.05861	0.02389	0.003	171.391	0.268E-07	0.020	103.9
5117	7.213	172.596	8.6344	0.05861	0.02392	0.003	171.390	0.258E-07	0.019	107.8
5116	7.214	172.495	8.6602	0.05392	0.02393	0.003	171.391	0.250E-07	0.020	111.0
5115	7.214	172.380	8.6896	0.04942	0.02393	0.003	171.390	0.222E-07	0.021	124.7
5114	7.215	172.275	8.7176	0.04511	0.02398	0.003	171.389	0.199E-07	0.020	138.6
5113	7.509	172.516	9.3372	0.05858	0.02537	0.002	171.395	0.236E-07	0.017	115.5
5112	7.509	172.405	9.3701	0.05390	0.02542	0.003	171.395	0.214E-07	0.020	127.4
5111	7.508	172.322	9.3922	0.04940	0.02539	0.003	171.396	0.210E-07	0.019	129.4
5110	7.510	172.216	9.4284	0.04511	0.02541	0.003	171.395	0.182E-07	0.022	148.8
5108	7.699	172.438	9.8197	0.05858	0.02628	0.003	171.392	0.201E-07	0.020	133.6
5107	7.700	172.354	9.8476	0.05389	0.02629	0.003	171.391	0.203E-07	0.019	132.1
5106	7.700	172.266	9.8768	0.04940	0.02635	0.003	171.391	0.193E-07	0.022	139.0
5109	7.699	172.206	9.8939	0.04510	0.02634	0.003	171.398	0.202E-07	0.021	132.1
5104	7.868	172.517	10.2105	0.06345	0.02724	0.003	171.391	0.239E-07	0.022	112.3
5103	7.868	172.439	10.2371	0.05858	0.02723	0.003	171.390	0.251E-07	0.022	106.4
5102	7.868	172.328	10.2755	0.05390	0.02727	0.003	171.390	0.213E-07	0.021	125.2
5105	7.868	172.240	10.3059	0.04939	0.02732	0.003	171.392	0.199E-07	0.022	133.5
5101	8.060	172.553	10.6807	0.06854	0.02843	0.004	171.391	0.235E-07	0.027	113.7
5100	8.060	172.458	10.7164	0.06346	0.02816	0.003	171.391	0.210E-07	0.018	125.6
5099	8.061	172.379	10.7467	0.05857	0.02829	0.003	171.393	0.219E-07	0.019	120.5

5098	8.061	172.283	10.7837	0.05389	0.02821	0.003	171.390	0.197E-07	0.021	133.2
5097	8.400	172.472	11.5774	0.06852	0.03008	0.003	171.404	0.199E-07	0.019	131.3
5096	8.400	172.388	11.6120	0.06346	0.02998	0.003	171.404	0.193E-07	0.018	134.3
5095	8.400	172.317	11.6416	0.05858	0.03010	0.002	171.404	0.203E-07	0.018	128.0
5094	8.400	172.234	11.6763	0.05394	0.03002	0.003	171.413	0.170E-07	0.020	152.2
5093	8.652	172.424	12.2366	0.06859	0.03127	0.003	171.407	0.189E-07	0.020	135.6
5092	8.652	172.340	12.2734	0.06350	0.03129	0.003	171.407	0.181E-07	0.019	141.2
5091	8.652	172.270	12.3049	0.05861	0.03126	0.003	171.407	0.177E-07	0.018	143.7
5090	8.652	172.169	12.3501	0.05391	0.03128	0.003	171.407	0.145E-07	0.021	174.9
5089	8.824	172.488	12.6369	0.07927	0.03212	0.003	171.326	0.206E-07	0.022	124.4
5088	8.824	172.401	12.6762	0.07379	0.03216	0.003	171.325	0.201E-07	0.019	126.6
5087	8.824	172.282	12.7297	0.06849	0.03213	0.002	171.326	0.159E-07	0.016	159.5
5086	8.824	172.232	12.7525	0.06342	0.03213	0.003	171.330	0.174E-07	0.019	145.3
5083	9.121	172.502	13.3467	0.07930	0.03323	0.002	171.396	0.189E-07	0.015	132.5
5082	9.121	172.499	13.3480	0.07929	0.03325	0.002	171.396	0.186E-07	0.016	134.6
5081	9.121	172.423	13.3830	0.07382	0.03323	0.002	171.397	0.184E-07	0.015	135.6
5085	9.121	172.341	13.4192	0.06855	0.03330	0.003	171.395	0.180E-07	0.018	138.3
5084	9.121	172.272	13.4515	0.06347	0.03331	0.003	171.396	0.179E-07	0.018	138.9
5079	9.418	172.646	13.9560	0.09082	0.03446	0.002	171.411	0.202E-07	0.017	123.0
5078	9.418	172.570	13.9910	0.08515	0.03445	0.002	171.412	0.202E-07	0.016	123.0
5080	9.418	172.485	14.0307	0.07928	0.03437	0.002	171.411	0.195E-07	0.015	126.6
5077	9.418	172.409	14.0663	0.07384	0.03459	0.002	171.420	0.182E-07	0.014	136.2
5075	9.906	172.685	14.9532	0.09686	0.03624	0.002	171.422	0.208E-07	0.013	117.6
5074	9.906	172.591	14.9960	0.09077	0.03625	0.002	171.420	0.196E-07	0.015	124.5
5073	9.906	172.511	15.0323	0.08492	0.03612	0.002	171.421	0.187E-07	0.014	129.7
5076	9.906	172.381	15.0918	0.07380	0.03636	0.002	171.422	0.203E-07	0.013	119.7
5072	10.149	172.732	15.3907	0.10310	0.03682	0.002	171.423	0.208E-07	0.013	116.1
5071	10.149	172.659	15.4234	0.09685	0.03698	0.002	171.424	0.206E-07	0.013	117.5
5070	10.149	172.571	15.4626	0.09080	0.03693	0.002	171.424	0.194E-07	0.016	124.3
5069	10.149	172.483	15.5021	0.08498	0.03681	0.002	171.423	0.183E-07	0.013	130.5
5068	10.504	172.878	15.9453	0.11622	0.03775	0.002	171.430	0.221E-07	0.011	108.2
5067	10.504	172.799	15.9793	0.10957	0.03789	0.002	171.431	0.219E-07	0.012	109.2
5066	10.504	172.727	16.0102	0.10311	0.03785	0.002	171.429	0.229E-07	0.011	104.0
5065	10.504	172.664	16.0374	0.09687	0.03796	0.002	171.430	0.237E-07	0.011	100.7
5064	10.504	172.580	16.0736	0.09081	0.03814	0.002	171.429	0.229E-07	0.011	104.3
5062	10.904	173.231	16.4287	0.14485	0.03907	0.003	171.433	0.243E-07	0.019	99.0
5061	10.905	173.058	16.5005	0.13015	0.03917	0.002	171.435	0.242E-07	0.018	99.0
5060	10.905	172.849	16.5862	0.11623	0.03902	0.002	171.435	0.216E-07	0.011	110.0
5063	10.904	172.690	16.6501	0.10312	0.03903	0.002	171.434	0.225E-07	0.011	105.1
5228	11.688	174.512	17.0122	0.13859	0.03995	0.001	172.808	0.270E-07	0.011	87.9
5227	11.688	174.417	17.0474	0.13128	0.03994	0.001	172.807	0.267E-07	0.011	88.7
5226	11.688	174.330	17.0794	0.12417	0.03986	0.001	172.808	0.262E-07	0.008	90.0
5225	11.688	174.240	17.1129	0.11726	0.04005	0.001	172.807	0.255E-07	0.009	92.7
5222	12.323	174.644	17.7160	0.15397	0.04147	0.002	172.791	0.289E-07	0.012	81.8
5221	12.323	174.548	17.7492	0.14608	0.04145	0.001	172.790	0.287E-07	0.011	82.1
5220	12.323	174.444	17.7851	0.13858	0.04111	0.001	172.791	0.255E-07	0.011	91.7
5223	12.323	174.361	17.8134	0.13122	0.04154	0.001	172.790	0.284E-07	0.010	82.8
5224	12.323	174.269	17.8453	0.12410	0.04140	0.001	172.792	0.268E-07	0.009	87.5
5056	12.475	173.710	18.1966	0.19361	0.04268	0.002	171.419	0.302E-07	0.018	78.5
5055	12.475	173.501	18.2672	0.17654	0.04273	0.002	171.420	0.293E-07	0.016	80.7
5057	12.475	173.316	18.3299	0.16025	0.04277	0.002	171.420	0.297E-07	0.014	79.3
5058	12.475	173.122	18.3954	0.14475	0.04273	0.001	171.421	0.292E-07	0.009	80.3
5059	12.475	172.951	18.4531	0.13008	0.04286	0.001	171.420	0.287E-07	0.009	81.7
5218	13.219	174.915	18.5256	0.17810	0.04344	0.002	172.799	0.342E-07	0.015	69.3
5217	13.219	174.799	18.5621	0.16979	0.04333	0.002	172.798	0.319E-07	0.013	74.0
5216	13.219	174.700	18.5930	0.16168	0.04338	0.002	172.798	0.317E-07	0.012	74.2
5219	13.219	174.608	18.6217	0.15427	0.04338	0.002	172.798	0.313E-07	0.014	75.1
5214	14.156	175.207	19.2268	0.21327	0.04501	0.002	172.781	0.330E-07	0.014	71.7
5215	14.156	175.102	19.2572	0.20418	0.04507	0.002	172.783	0.319E-07	0.014	74.1
5213	14.156	174.980	19.2921	0.19525	0.04481	0.001	172.781	0.326E-07	0.007	71.9
5212	14.155	174.781	19.3485	0.17804	0.04492	0.001	172.789	0.318E-07	0.007	73.6
5211	16.210	175.588	20.4965	0.26178	0.04802	0.001	172.794	0.381E-07	0.005	62.1
5210	16.209	175.265	20.5749	0.23204	0.04821	0.001	172.795	0.363E-07	0.005	65.2
5209	16.209	174.989	20.6419	0.20414	0.04841	0.001	172.795	0.370E-07	0.006	63.9
5208	16.208	174.710	20.7094	0.17804	0.04869	0.001	172.795	0.358E-07	0.007	66.2
5207	17.568	176.105	21.1018	0.31550	0.05035	0.002	172.795	0.398E-07	0.015	60.7
5206	17.567	175.777	21.1748	0.28271	0.05048	0.002	172.798	0.410E-07	0.013	58.7
5205	17.567	175.447	21.2484	0.25174	0.05050	0.001	172.797	0.407E-07	0.010	58.9
5204	17.564	175.123	21.3193	0.22260	0.05055	0.001	172.794	0.400E-07	0.007	59.7
5203	19.824	175.971	22.1276	0.31545	0.05345	0.001	172.805	0.440E-07	0.010	55.4
5202	19.821	175.632	22.1938	0.28260	0.05352	0.001	172.806	0.432E-07	0.007	56.3
5201	19.819	175.306	22.2579	0.25166	0.05355	0.001	172.806	0.428E-07	0.005	56.7

5200	19.816	175.016	22.3145	0.22253	0.05372 0.001	172.807	0.436E-07 0.005	55.6
5036	21.884	174.848	23.0815	0.35870	0.05654 0.001	171.422	0.459E-07 0.007	53.9
5035	21.883	174.527	23.1397	0.32377	0.05675 0.001	171.422	0.463E-07 0.007	53.5
5034	21.883	174.092	23.2184	0.28006	0.05688 0.001	171.422	0.465E-07 0.004	53.1
5033	21.882	173.852	23.2617	0.25941	0.05690 0.001	171.424	0.447E-07 0.005	55.1
5032	23.922	174.688	23.7311	0.35856	0.05887 0.000	171.421	0.475E-07 0.004	52.7
5031	23.921	174.394	23.7805	0.32366	0.05907 0.000	171.421	0.481E-07 0.004	52.1
5030	23.921	173.955	23.8546	0.27996	0.05925 0.001	171.420	0.477E-07 0.005	52.5
5029	23.919	173.774	23.8847	0.25932	0.05941 0.001	171.420	0.478E-07 0.005	52.4
5028	29.430	174.636	25.0893	0.38253	0.06481 0.000	171.416	0.554E-07 0.004	47.1
5027	29.430	174.187	25.1546	0.32348	0.06511 0.000	171.415	0.565E-07 0.003	46.2
5026	29.428	173.695	25.2256	0.26943	0.06534 0.001	171.416	0.529E-07 0.004	49.3
5025	29.426	173.546	25.2468	0.24924	0.06545 0.001	171.417	0.541E-07 0.004	48.3
5024	35.165	174.507	26.1949	0.38230	0.07031 0.001	171.422	0.593E-07 0.005	45.7
5023	35.167	174.030	26.2568	0.32327	0.07064 0.000	171.422	0.588E-07 0.003	46.1
5022	35.168	173.600	26.3126	0.26926	0.07090 0.000	171.422	0.600E-07 0.004	45.2
5021	35.168	173.400	26.3383	0.24906	0.07075 0.001	171.422	0.579E-07 0.006	46.7
5020	41.171	174.793	27.0900	0.44612	0.07535 0.000	171.411	0.647E-07 0.003	43.4
5019	41.171	174.341	27.1430	0.38225	0.07567 0.000	171.409	0.654E-07 0.003	43.0
5018	41.171	173.858	27.1996	0.32311	0.07593 0.000	171.410	0.654E-07 0.003	43.0
5017	41.169	173.463	27.2457	0.26918	0.07595 0.000	171.409	0.647E-07 0.003	43.3
5016	45.409	174.992	27.6359	0.48681	0.07868 0.000	171.424	0.666E-07 0.003	43.2
5015	45.407	174.481	27.6923	0.41979	0.07892 0.000	171.425	0.656E-07 0.003	43.8
5014	45.407	174.035	27.7417	0.35786	0.07921 0.000	171.424	0.687E-07 0.003	41.9
5013	45.409	173.595	27.7909	0.30091	0.07941 0.000	171.425	0.644E-07 0.004	44.7
5012	53.055	174.772	28.5513	0.48654	0.08445 0.000	171.414	0.729E-07 0.002	40.9
5011	53.054	174.312	28.5980	0.41955	0.08478 0.000	171.415	0.732E-07 0.002	40.8
5010	53.043	173.822	28.6468	0.35757	0.08501 0.000	171.415	0.592E-07 0.003	50.5
5009	53.036	173.152	28.7146	0.24886	0.08544 0.001	171.416	0.795E-07 0.004	37.6
5008	59.624	174.219	29.2676	0.41943	0.08943 0.000	171.428	0.786E-07 0.003	39.2
5007	59.618	173.797	29.3075	0.35739	0.08966 0.000	171.428	0.779E-07 0.003	39.5
5006	59.607	173.410	29.3437	0.30051	0.08982 0.000	171.429	0.758E-07 0.003	40.6
5005	59.606	173.054	29.3778	0.24864	0.09001 0.001	171.431	0.717E-07 0.005	42.9
5004	66.117	174.479	29.8271	0.48606	0.09350 0.000	171.374	0.808E-07 0.002	39.1
5003	66.117	174.050	29.8662	0.41915	0.09371 0.000	171.377	0.812E-07 0.003	38.9
5002	66.115	173.659	29.9018	0.35735	0.09394 0.000	171.379	0.829E-07 0.003	38.1
5001	66.112	173.279	29.9362	0.30046	0.09413 0.001	171.381	0.782E-07 0.004	40.4

#### Nominal Temperature 203. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
7160	1.255	204.033	0.7664	0.05909	0.01355 0.003	200.608	0.873E-06 0.030	19.6
7159	1.255	203.728	0.7676	0.05395	0.01353 0.003	200.607	0.839E-06 0.032	20.3
7158	1.255	203.438	0.7689	0.04904	0.01349 0.003	200.609	0.796E-06 0.034	21.4
7157	1.255	203.162	0.7700	0.04436	0.01349 0.003	200.615	0.759E-06 0.032	22.5
7156	2.240	203.926	1.4081	0.06446	0.01402 0.002	200.575	0.425E-06 0.021	22.6
7155	2.240	203.632	1.4106	0.05908	0.01400 0.002	200.576	0.401E-06 0.024	23.9
7154	2.240	203.373	1.4128	0.05394	0.01396 0.002	200.576	0.399E-06 0.025	24.0
7153	2.240	203.147	1.4147	0.04904	0.01366 0.004	200.594	0.345E-06 0.039	27.2
7152	2.870	204.029	1.8378	0.07009	0.01442 0.002	200.622	0.299E-06 0.022	25.3
7151	2.870	203.760	1.8410	0.06448	0.01440 0.002	200.622	0.299E-06 0.025	25.3
7150	2.870	203.498	1.8441	0.05909	0.01436 0.002	200.622	0.291E-06 0.022	25.9
7149	2.870	203.246	1.8471	0.05395	0.01437 0.002	200.619	0.294E-06 0.025	25.7
7148	3.548	204.100	2.3179	0.07589	0.01486 0.002	200.630	0.229E-06 0.018	27.0
7147	3.548	203.811	2.3225	0.07003	0.01487 0.002	200.628	0.218E-06 0.020	28.3
7146	3.548	203.564	2.3270	0.06443	0.01487 0.002	200.629	0.223E-06 0.022	27.8
7145	3.548	203.308	2.3310	0.05905	0.01484 0.003	200.628	0.212E-06 0.026	29.1
7144	4.392	203.830	2.9519	0.07585	0.01559 0.002	200.629	0.174E-06 0.019	29.2
7143	4.392	203.578	2.9575	0.07000	0.01557 0.002	200.631	0.169E-06 0.021	30.2
7142	4.392	203.340	2.9633	0.06440	0.01554 0.002	200.630	0.166E-06 0.017	30.6
7141	4.392	203.135	2.9678	0.05904	0.01502 0.003	200.632	0.133E-06 0.028	36.9
7140	4.876	203.944	3.3259	0.08194	0.01604 0.002	200.622	0.158E-06 0.016	29.3
7139	4.876	203.697	3.3323	0.07587	0.01604 0.002	200.623	0.157E-06 0.015	29.6
7138	4.876	203.454	3.3386	0.07003	0.01602 0.002	200.622	0.154E-06 0.017	30.3
7137	4.876	203.219	3.3451	0.06442	0.01589 0.002	200.624	0.139E-06 0.019	33.1
7136	5.659	203.715	3.9663	0.08193	0.01687 0.002	200.624	0.133E-06 0.015	30.9
7135	5.659	203.479	3.9742	0.07586	0.01686 0.002	200.626	0.129E-06 0.015	31.8
7134	5.659	203.252	3.9819	0.07001	0.01681 0.002	200.626	0.124E-06 0.016	33.1
7133	5.659	203.027	3.9895	0.06442	0.01677 0.002	200.626	0.115E-06 0.017	35.4

7132	6.107	203.814	4.3396	0.08825	0.01739	0.002	200.626	0.120E-06	0.017	32.1
7131	6.107	203.575	4.3491	0.08194	0.01737	0.002	200.625	0.116E-06	0.015	33.3
7130	6.108	203.360	4.3580	0.07587	0.01736	0.002	200.629	0.115E-06	0.016	33.6
7129	6.108	203.142	4.3664	0.07003	0.01718	0.002	200.627	0.105E-06	0.020	36.5
7128	6.928	203.570	5.0697	0.08823	0.01842	0.002	200.626	0.101E-06	0.018	34.6
7127	6.929	203.360	5.0809	0.08192	0.01839	0.002	200.626	0.100E-06	0.016	35.0
7126	6.930	203.152	5.0914	0.07585	0.01837	0.002	200.626	0.975E-07	0.016	36.0
7125	6.930	202.951	5.1017	0.07002	0.01822	0.002	200.628	0.890E-07	0.016	39.1
7124	7.822	203.524	5.8966	0.09477	0.01970	0.002	200.628	0.866E-07	0.021	37.4
7123	7.822	203.320	5.9099	0.08822	0.01966	0.002	200.630	0.839E-07	0.019	38.5
7122	7.824	203.113	5.9244	0.08191	0.01961	0.002	200.628	0.790E-07	0.018	40.8
7121	7.826	202.926	5.9375	0.07585	0.01926	0.002	200.625	0.685E-07	0.017	46.2
7120	8.525	203.309	6.5901	0.09476	0.02079	0.002	200.623	0.738E-07	0.021	41.6
7119	8.528	203.142	6.6046	0.08841	0.02073	0.002	200.624	0.747E-07	0.019	41.0
7118	8.527	202.942	6.6191	0.08209	0.02067	0.002	200.625	0.684E-07	0.019	44.6
7117	8.528	202.775	6.6326	0.07602	0.02064	0.002	200.624	0.687E-07	0.017	44.3
7116	9.031	203.186	7.1036	0.09495	0.02164	0.003	200.622	0.695E-07	0.023	42.7
7115	9.031	203.028	7.1167	0.08819	0.02154	0.003	200.651	0.662E-07	0.024	44.7
7114	9.031	202.836	7.1328	0.08189	0.02151	0.002	200.624	0.664E-07	0.019	44.5
7113	9.031	202.659	7.1478	0.07583	0.02152	0.002	200.623	0.637E-07	0.020	46.4
7112	9.458	203.108	7.5448	0.09466	0.02231	0.002	200.636	0.682E-07	0.020	42.4
7111	9.459	202.935	7.5615	0.08812	0.02222	0.002	200.636	0.654E-07	0.018	44.0
7110	9.460	202.774	7.5774	0.08182	0.02219	0.002	200.637	0.652E-07	0.016	44.0
7109	9.461	202.607	7.5937	0.07575	0.02224	0.002	200.636	0.643E-07	0.016	44.7
7108	9.998	202.971	8.1178	0.09462	0.02325	0.002	200.637	0.606E-07	0.020	46.3
7107	9.999	202.810	8.1355	0.08809	0.02319	0.002	200.638	0.592E-07	0.017	47.2
7106	10.000	202.656	8.1526	0.08180	0.02318	0.002	200.636	0.597E-07	0.016	46.8
7105	10.001	202.494	8.1702	0.07574	0.02322	0.002	200.637	0.571E-07	0.016	48.9
7104	10.483	202.874	8.6391	0.09462	0.02412	0.002	200.636	0.583E-07	0.020	47.0
7103	10.484	202.731	8.6555	0.08811	0.02405	0.002	200.638	0.589E-07	0.017	46.3
7102	10.484	202.568	8.6749	0.08180	0.02407	0.002	200.637	0.565E-07	0.017	48.3
7101	10.485	202.417	8.6929	0.07574	0.02405	0.002	200.635	0.547E-07	0.017	49.8
7100	11.015	202.754	9.2191	0.09461	0.02509	0.002	200.631	0.531E-07	0.019	50.4
7099	11.016	202.609	9.2379	0.08809	0.02507	0.002	200.629	0.532E-07	0.017	50.2
7098	11.016	202.465	9.2567	0.08179	0.02504	0.002	200.630	0.521E-07	0.017	51.2
7097	11.017	202.320	9.2754	0.07574	0.02509	0.002	200.630	0.508E-07	0.017	52.6
7096	11.395	202.974	9.5962	0.10839	0.02598	0.003	200.622	0.537E-07	0.025	49.5
7095	11.396	202.834	9.6157	0.10169	0.02587	0.003	200.622	0.529E-07	0.021	50.1
7094	11.396	202.669	9.6379	0.09461	0.02579	0.002	200.623	0.495E-07	0.019	53.3
7093	11.397	202.522	9.6580	0.08808	0.02582	0.002	200.622	0.489E-07	0.017	53.9
7092	11.860	202.887	10.1028	0.10850	0.02686	0.003	200.616	0.528E-07	0.024	49.6
7091	11.861	202.721	10.1275	0.10148	0.02672	0.003	200.616	0.477E-07	0.021	54.5
7090	11.861	202.588	10.1462	0.09462	0.02670	0.002	200.616	0.489E-07	0.017	53.1
7089	11.863	202.442	10.1684	0.08809	0.02673	0.002	200.615	0.477E-07	0.018	54.5
7088	12.686	202.876	10.9743	0.11561	0.02848	0.003	200.619	0.489E-07	0.025	52.5
7087	12.686	202.731	10.9974	0.10837	0.02836	0.003	200.620	0.465E-07	0.022	54.9
7086	12.687	202.586	11.0202	0.10137	0.02828	0.002	200.619	0.442E-07	0.018	57.4
7085	12.687	202.436	11.0439	0.09460	0.02832	0.002	200.619	0.418E-07	0.018	60.8
7084	13.446	202.900	11.7518	0.12304	0.02989	0.003	200.619	0.476E-07	0.024	52.9
7083	13.447	202.750	11.7769	0.11559	0.02983	0.003	200.622	0.447E-07	0.023	56.2
7082	13.447	202.620	11.7985	0.10865	0.02974	0.002	200.622	0.432E-07	0.019	57.8
7081	13.447	202.489	11.8210	0.10164	0.02973	0.002	200.620	0.431E-07	0.017	57.9
7080	13.989	202.971	12.2805	0.13074	0.03091	0.003	200.651	0.444E-07	0.027	56.1
7079	13.989	202.833	12.3041	0.12305	0.03085	0.003	200.649	0.439E-07	0.024	56.7
7078	13.990	202.688	12.3303	0.11557	0.03076	0.002	200.650	0.410E-07	0.020	60.4
7077	13.990	202.552	12.3537	0.10834	0.03073	0.002	200.648	0.397E-07	0.018	62.3
7076	14.907	203.191	13.1161	0.14689	0.03266	0.004	200.696	0.483E-07	0.031	51.2
7075	14.906	203.047	13.1409	0.13872	0.03251	0.003	200.695	0.460E-07	0.026	53.4
7074	14.904	202.907	13.1639	0.13080	0.03247	0.003	200.695	0.445E-07	0.022	55.0
7073	14.906	202.779	13.1887	0.12311	0.03235	0.002	200.696	0.435E-07	0.019	56.0
7072	15.456	203.143	13.6212	0.14690	0.03343	0.003	200.724	0.456E-07	0.026	53.5
7176	15.277	202.223	13.6284	0.14632	0.03379	0.004	199.928	0.354E-07	0.030	69.7
7172	15.276	202.218	13.6288	0.14633	0.03379	0.004	199.930	0.346E-07	0.031	71.3
7184	15.279	202.220	13.6303	0.14631	0.03375	0.004	199.923	0.353E-07	0.030	69.9
7180	15.278	202.213	13.6308	0.14632	0.03384	0.004	199.928	0.347E-07	0.030	71.2
7171	15.276	202.143	13.6423	0.13819	0.03366	0.003	199.931	0.394E-07	0.027	62.3
7071	15.456	203.004	13.6463	0.13871	0.03339	0.003	200.725	0.443E-07	0.021	54.9
7183	15.278	202.102	13.6516	0.13818	0.03371	0.003	199.925	0.357E-07	0.026	68.8
7175	15.277	202.080	13.6544	0.13818	0.03372	0.003	199.927	0.333E-07	0.025	73.9
7179	15.278	202.081	13.6552	0.13817	0.03370	0.003	199.927	0.332E-07	0.026	73.9
7070	15.455	202.884	13.6672	0.13078	0.03329	0.002	200.726	0.447E-07	0.017	54.2
7174	15.277	201.974	13.6740	0.13028	0.03358	0.003	199.930	0.338E-07	0.024	72.3

7170	15.276	201.957	13.6760	0.13027	0.03357	0.003	199.930	0.320E-07	0.024	76.3
7178	15.278	201.964	13.6764	0.13026	0.03361	0.003	199.925	0.335E-07	0.023	73.0
7182	15.278	201.953	13.6791	0.13026	0.03360	0.003	199.926	0.321E-07	0.023	76.2
7069	15.455	202.741	13.6933	0.12308	0.03309	0.002	200.728	0.402E-07	0.019	59.8
7169	15.276	201.825	13.7004	0.12259	0.03351	0.003	199.930	0.303E-07	0.022	80.5
7177	15.278	201.831	13.7011	0.12260	0.03352	0.003	199.928	0.311E-07	0.022	78.4
7181	15.278	201.823	13.7028	0.12260	0.03350	0.003	199.925	0.304E-07	0.022	80.0
7173	15.277	201.808	13.7047	0.12260	0.03352	0.003	199.929	0.287E-07	0.021	85.0
7068	16.123	203.208	14.1850	0.16382	0.03476	0.004	200.605	0.467E-07	0.030	52.2
7067	16.124	203.075	14.2097	0.15520	0.03464	0.003	200.605	0.460E-07	0.024	52.7
7066	16.124	202.931	14.2360	0.14681	0.03455	0.003	200.605	0.437E-07	0.020	55.3
7065	16.125	202.801	14.2605	0.13864	0.03455	0.002	200.606	0.434E-07	0.017	55.7
7168	16.062	202.267	14.3060	0.15465	0.03514	0.004	199.910	0.379E-07	0.029	64.6
7167	16.062	202.128	14.3321	0.14626	0.03502	0.003	199.910	0.356E-07	0.022	68.3
7166	16.063	202.011	14.3543	0.13812	0.03496	0.003	199.910	0.359E-07	0.020	67.7
7165	16.063	201.875	14.3797	0.13020	0.03498	0.002	199.909	0.343E-07	0.018	70.8
7063	16.786	203.296	14.7102	0.17265	0.03579	0.004	200.638	0.459E-07	0.029	52.8
7062	16.786	203.166	14.7340	0.16379	0.03569	0.003	200.638	0.458E-07	0.024	52.7
7061	16.787	203.023	14.7607	0.15516	0.03559	0.002	200.638	0.435E-07	0.018	55.3
7164	16.600	202.212	14.7611	0.15466	0.03596	0.003	199.909	0.376E-07	0.024	64.6
7064	16.786	202.884	14.7855	0.14675	0.03556	0.002	200.638	0.420E-07	0.018	57.0
7163	16.600	202.078	14.7861	0.14628	0.03587	0.003	199.912	0.356E-07	0.022	67.9
7162	16.600	201.938	14.8122	0.13810	0.03577	0.003	199.909	0.332E-07	0.020	72.6
7161	16.600	201.838	14.8310	0.13021	0.03574	0.002	199.911	0.345E-07	0.018	69.6
7059	17.556	203.480	15.2672	0.19157	0.03710	0.004	200.628	0.468E-07	0.032	51.8
7058	17.556	203.349	15.2911	0.18223	0.03698	0.003	200.628	0.466E-07	0.027	51.8
7057	17.557	203.197	15.3193	0.17269	0.03676	0.002	200.628	0.434E-07	0.019	55.2
7060	17.555	203.072	15.3407	0.16376	0.03679	0.002	200.627	0.447E-07	0.019	53.5
7056	18.737	203.487	16.0986	0.20055	0.03871	0.003	200.616	0.478E-07	0.026	50.3
7055	18.737	203.355	16.1222	0.19133	0.03859	0.003	200.617	0.466E-07	0.021	51.3
7054	18.739	203.211	16.1490	0.18195	0.03856	0.002	200.616	0.452E-07	0.019	52.8
7053	18.739	203.070	16.1744	0.17256	0.03849	0.002	200.614	0.438E-07	0.017	54.3
7052	20.135	203.639	16.9519	0.22036	0.04057	0.003	200.623	0.482E-07	0.023	49.6
7051	20.135	203.500	16.9760	0.21035	0.04052	0.002	200.622	0.477E-07	0.020	50.1
7050	20.136	203.362	17.0008	0.20055	0.04045	0.002	200.623	0.464E-07	0.018	51.3
7049	20.136	203.211	17.0271	0.19098	0.04047	0.002	200.624	0.440E-07	0.016	54.1
7048	21.886	204.175	17.8282	0.27407	0.04307	0.004	200.605	0.521E-07	0.032	46.4
7047	21.886	203.892	17.8751	0.25193	0.04289	0.003	200.604	0.511E-07	0.022	47.0
7046	21.887	203.597	17.9248	0.23069	0.04279	0.002	200.604	0.481E-07	0.017	49.8
7045	21.887	203.322	17.9708	0.21038	0.04271	0.002	200.604	0.460E-07	0.015	51.8
7185	24.540	204.017	19.0914	0.27407	0.04591	0.002	200.671	0.514E-07	0.016	47.0
7044	24.540	203.985	19.0964	0.27404	0.04589	0.002	200.647	0.503E-07	0.016	47.9
7043	24.539	203.721	19.1371	0.25184	0.04586	0.002	200.647	0.508E-07	0.014	47.3
7042	24.539	203.457	19.1783	0.23063	0.04586	0.002	200.646	0.502E-07	0.013	47.8
7041	24.538	203.188	19.2199	0.21034	0.04576	0.002	200.645	0.468E-07	0.013	51.0
7040	26.798	204.095	19.9663	0.29710	0.04830	0.002	200.641	0.520E-07	0.013	46.7
7039	26.797	203.822	20.0062	0.27395	0.04826	0.002	200.641	0.512E-07	0.013	47.3
7038	26.797	203.564	20.0442	0.25176	0.04829	0.001	200.640	0.514E-07	0.011	47.0
7037	26.795	203.308	20.0811	0.23056	0.04834	0.001	200.640	0.506E-07	0.012	47.8
7036	30.068	203.887	21.0820	0.29711	0.05166	0.001	200.642	0.538E-07	0.012	45.8
7035	30.068	203.629	21.1173	0.27397	0.05169	0.001	200.641	0.534E-07	0.012	46.1
7034	30.068	203.380	21.1513	0.25180	0.05171	0.001	200.641	0.525E-07	0.011	46.8
7033	30.066	203.131	21.1847	0.23056	0.05175	0.001	200.641	0.502E-07	0.012	48.8
7032	33.470	203.953	22.0220	0.32110	0.05490	0.001	200.620	0.575E-07	0.011	43.6
7031	33.467	203.717	22.0514	0.29702	0.05491	0.001	200.620	0.594E-07	0.009	42.1
7030	33.467	203.453	22.0852	0.27390	0.05495	0.001	200.619	0.565E-07	0.010	44.3
7029	33.464	203.224	22.1134	0.25176	0.05501	0.001	200.628	0.556E-07	0.010	44.9
7028	37.327	203.784	22.9574	0.32108	0.05837	0.001	200.636	0.594E-07	0.009	43.1
7027	37.327	203.544	22.9860	0.29702	0.05840	0.001	200.635	0.591E-07	0.008	43.2
7026	37.327	203.324	23.0122	0.27392	0.05840	0.001	200.635	0.600E-07	0.009	42.5
7025	37.327	203.107	23.0381	0.25175	0.05849	0.001	200.636	0.606E-07	0.008	42.1
7024	41.870	204.110	23.8394	0.37189	0.06209	0.001	200.648	0.636E-07	0.007	41.2
7023	41.869	203.864	23.8665	0.34617	0.06217	0.001	200.651	0.628E-07	0.006	41.7
7022	41.871	203.624	23.8935	0.32095	0.06226	0.001	200.649	0.628E-07	0.006	41.7
7021	41.873	203.386	23.9204	0.29692	0.06226	0.001	200.646	0.608E-07	0.006	43.0
7020	47.442	204.004	24.8102	0.38503	0.06650	0.001	200.637	0.665E-07	0.006	40.5
7019	47.446	203.782	24.8337	0.35864	0.06655	0.001	200.638	0.682E-07	0.005	39.6
7018	47.447	203.443	24.8689	0.32080	0.06646	0.001	200.637	0.663E-07	0.006	40.5
7017	47.447	203.206	24.8934	0.29678	0.06629	0.001	200.635	0.606E-07	0.008	44.1
7016	53.567	203.814	25.7275	0.38480	0.07099	0.001	200.637	0.704E-07	0.005	39.4
7015	53.570	203.593	25.7491	0.35842	0.07105	0.001	200.636	0.704E-07	0.005	39.4
7014	53.568	203.272	25.7799	0.32060	0.07111	0.001	200.637	0.689E-07	0.006	40.3

7013	53.568	203.062	25.8001	0.29664	0.07118	0.001	200.637	0.667E-07	0.008	41.6
7012	58.838	204.007	26.3861	0.42618	0.07458	0.001	200.641	0.730E-07	0.005	39.0
7011	58.838	203.673	26.4166	0.38479	0.07468	0.001	200.641	0.724E-07	0.006	39.3
7010	58.838	203.461	26.4360	0.35842	0.07470	0.001	200.642	0.716E-07	0.007	39.7
7009	58.836	203.142	26.4648	0.32065	0.07501	0.001	200.640	0.697E-07	0.008	40.9
7008	63.770	203.868	26.9688	0.42587	0.07789	0.001	200.626	0.767E-07	0.005	37.9
7007	63.762	203.539	26.9968	0.38452	0.07799	0.001	200.625	0.747E-07	0.005	38.9
7006	63.753	203.348	27.0125	0.35817	0.07797	0.001	200.625	0.764E-07	0.006	38.0
7005	63.745	203.045	27.0383	0.32043	0.07825	0.001	200.625	0.746E-07	0.007	39.0
7002	67.514	203.745	27.3787	0.42600	0.08036	0.001	200.591	0.786E-07	0.006	37.6
7004	67.507	203.407	27.4066	0.38463	0.08049	0.001	200.576	0.760E-07	0.007	38.8
7001	67.518	203.239	27.4221	0.35825	0.08056	0.001	200.596	0.781E-07	0.008	37.8
7003	67.509	202.938	27.4469	0.32051	0.08070	0.001	200.581	0.770E-07	0.009	38.4

Nominal Temperature 223. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)		
6179	0.863	226.563	0.4658	0.06634	0.01492	0.004	222.795	0.191E-05	0.047	16.2
6178	0.863	226.234	0.4668	0.06058	0.01494	0.004	222.795	0.193E-05	0.052	16.1
6177	0.864	225.913	0.4677	0.05508	0.01485	0.004	222.796	0.175E-05	0.051	17.6
6176	0.864	225.634	0.4683	0.04985	0.01488	0.005	222.798	0.190E-05	0.055	16.3
6175	1.985	226.452	1.0959	0.07220	0.01506	0.003	222.821	0.611E-06	0.027	21.8
6174	1.985	226.156	1.0976	0.06619	0.01501	0.003	222.821	0.601E-06	0.028	22.1
6173	1.985	225.861	1.0992	0.06044	0.01503	0.003	222.823	0.598E-06	0.031	22.2
6172	1.985	225.571	1.1008	0.05495	0.01502	0.003	222.824	0.565E-06	0.032	23.6
6171	2.699	223.468	1.5351	0.07125	0.01520	0.003	220.081	0.393E-06	0.026	24.4
6170	2.699	223.178	1.5375	0.06531	0.01523	0.003	220.080	0.391E-06	0.029	24.6
6169	2.699	222.918	1.5401	0.05964	0.01522	0.003	220.081	0.400E-06	0.033	24.1
6168	2.699	222.651	1.5423	0.05423	0.01501	0.004	220.080	0.344E-06	0.039	27.6
6167	3.518	223.515	2.0353	0.07745	0.01568	0.003	220.069	0.287E-06	0.026	26.0
6166	3.519	223.249	2.0386	0.07125	0.01569	0.003	220.069	0.297E-06	0.028	25.1
6165	3.519	222.965	2.0420	0.06532	0.01564	0.003	220.070	0.271E-06	0.031	27.5
6164	3.519	222.711	2.0452	0.05964	0.01564	0.003	220.070	0.267E-06	0.033	27.9
6163	4.338	223.315	2.5559	0.07745	0.01622	0.002	220.064	0.232E-06	0.023	26.5
6162	4.338	223.018	2.5605	0.07124	0.01623	0.003	220.065	0.209E-06	0.026	29.4
6161	4.338	222.807	2.5640	0.06530	0.01619	0.003	220.066	0.228E-06	0.026	26.9
6160	4.338	222.552	2.5680	0.05963	0.01605	0.004	220.065	0.201E-06	0.034	30.3
6159	5.035	223.407	3.0080	0.08388	0.01673	0.002	220.058	0.198E-06	0.016	27.2
6158	5.035	223.147	3.0130	0.07742	0.01673	0.002	220.059	0.197E-06	0.018	27.4
6157	5.035	222.898	3.0180	0.07123	0.01571	0.002	220.059	0.193E-06	0.020	27.9
6156	5.035	222.655	3.0227	0.06530	0.01670	0.002	220.059	0.188E-06	0.022	28.7
6155	5.711	223.260	3.4638	0.08387	0.01726	0.002	220.065	0.173E-06	0.015	27.9
6154	5.711	223.041	3.4689	0.07742	0.01728	0.002	220.095	0.172E-06	0.018	28.1
6153	5.712	222.755	3.4760	0.07122	0.01723	0.002	220.067	0.158E-06	0.020	30.5
6152	5.712	222.556	3.4807	0.06529	0.01722	0.002	220.066	0.172E-06	0.015	28.1
6151	6.356	223.382	3.9029	0.09064	0.01781	0.001	220.072	0.158E-06	0.012	27.9
6150	6.356	223.148	3.9093	0.08392	0.01780	0.001	220.073	0.162E-06	0.012	27.3
6149	6.356	222.905	3.9162	0.07748	0.01779	0.001	220.073	0.158E-06	0.013	27.9
6148	6.356	222.687	3.9221	0.07128	0.01777	0.002	220.073	0.161E-06	0.015	27.5
6147	6.950	223.018	4.3310	0.08385	0.01810	0.005	220.072	0.131E-06	0.042	31.1
6146	6.950	222.793	4.3380	0.07740	0.01841	0.002	220.075	0.151E-06	0.016	27.3
6145	6.951	222.600	4.3447	0.07121	0.01829	0.002	220.103	0.141E-06	0.014	29.1
6144	7.705	223.083	4.8710	0.09056	0.01906	0.001	220.089	0.123E-06	0.011	30.9
6143	7.705	222.864	4.8791	0.08385	0.01906	0.001	220.088	0.125E-06	0.013	30.5
6142	7.705	222.649	4.8871	0.07739	0.01902	0.002	220.089	0.122E-06	0.014	31.2
6141	7.705	222.437	4.8951	0.07120	0.01901	0.002	220.090	0.118E-06	0.014	32.3
6140	8.409	222.912	5.3960	0.09054	0.01978	0.001	220.062	0.112E-06	0.013	31.9
6139	8.409	222.690	5.4056	0.08384	0.01977	0.002	220.060	0.108E-06	0.013	32.9
6138	8.410	222.489	5.4148	0.07739	0.01974	0.002	220.061	0.107E-06	0.014	33.2
6137	8.411	222.289	5.4245	0.07120	0.01960	0.002	220.063	0.992E-07	0.019	35.7
6136	9.125	222.967	5.9309	0.09748	0.02056	0.001	220.059	0.995E-07	0.012	33.9
6135	9.126	222.759	5.9416	0.09052	0.02056	0.002	220.059	0.996E-07	0.015	33.9
6134	9.126	222.550	5.9525	0.08381	0.02053	0.002	220.060	0.955E-07	0.015	35.3
6133	9.126	222.349	5.9625	0.07737	0.02051	0.002	220.059	0.919E-07	0.017	36.6
6132	9.128	222.363	5.9635	0.07739	0.02035	0.002	220.061	0.903E-07	0.019	37.0
6131	9.695	222.856	6.3718	0.09744	0.02119	0.001	220.056	0.939E-07	0.012	34.5
6130	9.697	222.647	6.3840	0.09075	0.02120	0.002	220.055	0.903E-07	0.013	35.9
6129	9.698	222.460	6.3951	0.08377	0.02116	0.002	220.057	0.919E-07	0.014	35.3
6128	9.700	222.264	6.4075	0.07732	0.02095	0.002	220.056	0.824E-07	0.017	38.9

6127	10.389	222.918	6.9041	0.10466	0.02204	0.002	220.061	0.863E-07	0.015	36.1
6126	10.389	222.717	6.9164	0.09743	0.02204	0.002	220.061	0.851E-07	0.015	36.6
6125	10.389	222.539	6.9273	0.09046	0.02200	0.002	220.061	0.871E-07	0.016	35.7
6124	10.389	222.337	6.9398	0.08376	0.02185	0.002	220.061	0.779E-07	0.018	39.6
6123	10.806	222.841	7.2335	0.10464	0.02254	0.002	220.057	0.840E-07	0.014	36.3
6122	10.807	222.643	7.2470	0.09744	0.02255	0.002	220.059	0.822E-07	0.015	37.0
6121	10.807	222.450	7.2599	0.09062	0.02250	0.002	220.058	0.778E-07	0.015	39.0
6120	10.808	222.282	7.2718	0.08393	0.02235	0.002	220.059	0.762E-07	0.019	39.6
6119	11.466	222.919	7.7456	0.11232	0.02339	0.002	220.065	0.784E-07	0.016	37.7
6118	11.467	222.733	7.7592	0.10482	0.02338	0.002	220.065	0.792E-07	0.015	37.3
6117	11.468	222.538	7.7741	0.09761	0.02334	0.002	220.066	0.752E-07	0.016	39.1
6116	11.468	222.357	7.7875	0.09064	0.02331	0.002	220.066	0.733E-07	0.016	40.1
6115	11.469	222.179	7.8010	0.08393	0.02313	0.002	220.064	0.678E-07	0.019	43.0
6114	11.996	222.810	8.1709	0.11232	0.02407	0.002	220.054	0.748E-07	0.016	38.6
6113	11.997	222.608	8.1870	0.10465	0.02406	0.002	220.054	0.717E-07	0.016	40.2
6112	11.997	222.435	8.2004	0.09743	0.02402	0.002	220.056	0.712E-07	0.016	40.4
6111	11.998	222.260	8.2149	0.09048	0.02385	0.002	220.055	0.666E-07	0.019	42.8
6110	12.580	222.892	8.6240	0.11991	0.02485	0.002	220.055	0.725E-07	0.017	38.9
6109	12.581	222.704	8.6404	0.11220	0.02481	0.002	220.056	0.703E-07	0.015	40.0
6108	12.582	222.520	8.6562	0.10457	0.02479	0.002	220.059	0.684E-07	0.016	41.1
6107	12.583	222.349	8.6716	0.09749	0.02464	0.002	220.058	0.649E-07	0.017	43.0
6106	13.294	222.951	9.1794	0.12823	0.02575	0.002	220.061	0.660E-07	0.016	41.6
6105	13.294	222.766	9.1965	0.12023	0.02577	0.002	220.062	0.654E-07	0.016	42.1
6104	13.295	222.593	9.2127	0.11246	0.02576	0.002	220.062	0.654E-07	0.016	42.0
6103	13.296	222.417	9.2294	0.10495	0.02561	0.002	220.062	0.613E-07	0.017	44.5
6102	13.943	222.826	9.6972	0.12817	0.02669	0.002	220.059	0.627E-07	0.018	43.1
6101	13.943	222.659	9.7134	0.12017	0.02665	0.002	220.059	0.629E-07	0.016	42.9
6100	13.944	222.499	9.7294	0.11243	0.02662	0.002	220.059	0.637E-07	0.016	42.2
6099	13.945	222.333	9.7463	0.10468	0.02657	0.002	220.060	0.630E-07	0.013	42.6
6098	14.598	222.751	10.2106	0.12792	0.02754	0.002	220.068	0.638E-07	0.016	41.6
6097	14.597	222.587	10.2270	0.11992	0.02749	0.002	220.068	0.633E-07	0.013	41.8
6096	14.597	222.426	10.2431	0.11218	0.02746	0.002	220.067	0.635E-07	0.013	41.6
6095	14.597	222.259	10.2603	0.10460	0.02744	0.002	220.069	0.611E-07	0.013	43.2
6094	15.311	222.625	10.7671	0.12781	0.02846	0.002	220.040	0.619E-07	0.013	42.1
6093	15.312	222.458	10.7858	0.11982	0.02844	0.002	220.038	0.610E-07	0.013	42.6
6092	15.312	222.303	10.8026	0.11207	0.02839	0.001	220.039	0.602E-07	0.012	43.1
6091	15.314	222.152	10.8203	0.10460	0.02785	0.002	220.038	0.527E-07	0.018	48.3
6090	16.006	222.726	11.2746	0.13616	0.02940	0.002	220.069	0.605E-07	0.015	42.5
6089	16.006	222.559	11.2934	0.12791	0.02936	0.001	220.067	0.591E-07	0.012	43.4
6088	16.007	222.400	11.3118	0.11990	0.02933	0.002	220.069	0.579E-07	0.013	44.2
6087	16.007	222.239	11.3301	0.11218	0.02882	0.002	220.071	0.491E-07	0.018	51.3
6086	16.582	222.616	11.7071	0.13592	0.03013	0.002	220.064	0.549E-07	0.014	46.3
6085	16.582	222.486	11.7223	0.12772	0.03008	0.001	220.064	0.581E-07	0.012	43.7
6084	16.583	222.346	11.7391	0.12039	0.03009	0.002	220.065	0.578E-07	0.013	43.9
6083	16.583	222.204	11.7558	0.11264	0.02955	0.002	220.065	0.514E-07	0.016	48.4
6082	17.258	222.932	12.1507	0.15394	0.03111	0.002	220.080	0.628E-07	0.017	40.3
6081	17.258	222.705	12.1782	0.14507	0.03105	0.002	220.080	0.523E-07	0.014	48.2
6080	17.259	222.607	12.1905	0.13655	0.03100	0.002	220.081	0.604E-07	0.013	41.7
6079	17.260	222.440	12.2111	0.12820	0.03100	0.002	220.084	0.576E-07	0.013	43.6
6078	17.260	222.144	12.2470	0.11226	0.03039	0.002	220.082	0.498E-07	0.018	49.4
6077	18.130	222.776	12.7690	0.15332	0.03217	0.002	220.073	0.559E-07	0.015	44.6
6076	18.131	222.624	12.7884	0.14455	0.03215	0.002	220.075	0.556E-07	0.014	44.8
6075	18.131	222.492	12.8047	0.13605	0.03212	0.001	220.076	0.582E-07	0.012	42.8
6074	18.131	222.372	12.8198	0.12781	0.03157	0.002	220.107	0.507E-07	0.015	48.1
6073	18.780	222.702	13.2089	0.15332	0.03299	0.002	220.062	0.565E-07	0.014	43.8
6072	18.780	222.553	13.2277	0.14456	0.03297	0.002	220.063	0.563E-07	0.013	43.9
6071	18.780	222.405	13.2463	0.13605	0.03294	0.001	220.063	0.558E-07	0.012	44.2
6070	18.782	222.290	13.2621	0.12782	0.03271	0.002	220.093	0.526E-07	0.017	46.6
6069	19.494	223.113	13.6138	0.18116	0.03401	0.002	220.078	0.579E-07	0.019	42.8
6068	19.495	222.793	13.6548	0.16234	0.03392	0.002	220.079	0.557E-07	0.014	44.2
6067	19.494	222.497	13.6924	0.14455	0.03385	0.001	220.079	0.550E-07	0.012	44.6
6066	19.495	222.209	13.7296	0.12780	0.03331	0.002	220.080	0.478E-07	0.016	50.4
6065	20.234	223.671	13.9965	0.22190	0.03522	0.004	220.070	0.596E-07	0.032	41.8
6064	20.234	223.342	14.0387	0.20096	0.03498	0.003	220.071	0.575E-07	0.022	42.9
6063	20.236	223.025	14.0808	0.18106	0.03479	0.002	220.072	0.560E-07	0.015	43.8
6062	20.237	222.701	14.1231	0.16222	0.03451	0.002	220.071	0.508E-07	0.018	47.7
6061	23.126	223.522	15.6188	0.23259	0.03834	0.002	220.069	0.574E-07	0.020	42.5
6060	23.124	223.206	15.6583	0.21117	0.03825	0.002	220.070	0.564E-07	0.015	43.1
6059	23.129	223.209	15.6604	0.21117	0.03823	0.002	220.070	0.565E-07	0.015	43.0
6058	23.129	222.901	15.7004	0.19081	0.03818	0.002	220.074	0.548E-07	0.013	44.2
6057	23.131	222.590	15.7421	0.17149	0.03807	0.002	220.070	0.507E-07	0.013	47.6
6056	26.500	223.516	17.1808	0.25494	0.04190	0.002	220.050	0.577E-07	0.015	42.2

6055	26.499	223.221	17.2177	0.23258	0.04183	0.002	220.050	0.580E-07	0.013	41.8
6054	26.499	222.925	17.2553	0.21118	0.04181	0.001	220.050	0.571E-07	0.011	42.4
6053	26.497	222.660	17.2880	0.19085	0.04172	0.001	220.064	0.558E-07	0.010	43.2
6052	29.415	223.332	18.3366	0.25498	0.04472	0.001	220.068	0.595E-07	0.011	40.9
6051	29.413	223.044	18.3712	0.23256	0.04470	0.001	220.068	0.592E-07	0.011	41.1
6050	29.412	222.763	18.4052	0.21117	0.04465	0.001	220.068	0.575E-07	0.010	42.2
6049	29.409	222.498	18.4366	0.19076	0.04476	0.001	220.067	0.579E-07	0.009	42.0
6048	32.405	223.395	19.3297	0.27832	0.04731	0.001	220.037	0.582E-07	0.008	42.1
6047	32.406	223.113	19.3629	0.25486	0.04735	0.001	220.036	0.588E-07	0.007	41.6
6046	32.406	222.823	19.3970	0.23243	0.04734	0.001	220.036	0.558E-07	0.007	43.7
6045	32.408	222.561	19.4283	0.21106	0.04736	0.001	220.037	0.548E-07	0.007	44.5
6044	35.931	223.476	20.3381	0.30271	0.05035	0.001	220.027	0.603E-07	0.007	41.2
6043	35.924	223.186	20.3684	0.27821	0.05036	0.001	220.027	0.590E-07	0.006	42.0
6042	35.927	222.910	20.4000	0.25475	0.05040	0.001	220.027	0.579E-07	0.006	42.8
6041	35.930	222.656	20.4292	0.23234	0.05040	0.001	220.026	0.579E-07	0.006	42.7
6036	39.134	223.624	21.1284	0.32891	0.05264	0.001	220.030	0.612E-07	0.004	40.8
6035	39.132	223.325	21.1598	0.30310	0.05292	0.001	220.031	0.613E-07	0.005	40.9
6034	39.131	222.796	21.2162	0.25501	0.05309	0.001	220.031	0.617E-07	0.005	40.7
6037	39.135	222.802	21.2165	0.25506	0.05306	0.001	220.030	0.625E-07	0.005	40.1
6038	39.135	222.797	21.2170	0.25463	0.05304	0.001	220.030	0.624E-07	0.005	40.1
6040	39.139	222.790	21.2187	0.25465	0.05306	0.001	220.029	0.614E-07	0.005	40.8
6039	39.137	222.785	21.2189	0.25464	0.05304	0.001	220.029	0.606E-07	0.005	41.4
6033	39.128	222.547	21.2422	0.23255	0.05300	0.001	220.031	0.600E-07	0.005	41.7
6032	42.490	223.444	21.8971	0.32831	0.05560	0.001	220.036	0.630E-07	0.005	40.4
6031	42.488	223.168	21.9249	0.30329	0.05565	0.001	220.036	0.610E-07	0.004	41.7
6030	42.487	222.916	21.9506	0.27836	0.05567	0.000	220.036	0.620E-07	0.004	41.0
6029	42.486	222.659	21.9767	0.25493	0.05531	0.001	220.036	0.568E-07	0.005	44.4
6027	45.074	223.267	22.4379	0.32837	0.05765	0.001	219.968	0.644E-07	0.004	40.0
6026	45.076	223.263	22.4385	0.32820	0.05764	0.001	219.969	0.639E-07	0.004	40.3
6025	45.074	223.020	22.4624	0.30357	0.05770	0.000	219.969	0.651E-07	0.004	39.6
6024	45.074	222.786	22.4857	0.27909	0.05776	0.000	219.969	0.676E-07	0.004	38.1
6023	45.073	222.533	22.5105	0.25563	0.05728	0.001	219.970	0.608E-07	0.006	42.0
6028	45.074	222.529	22.5112	0.25489	0.05779	0.001	219.968	0.657E-07	0.005	39.2
6022	48.824	223.465	23.1085	0.35565	0.06053	0.001	220.033	0.688E-07	0.005	38.2
6021	48.824	223.199	23.1339	0.32905	0.06055	0.001	220.032	0.675E-07	0.004	38.9
6020	48.821	222.964	23.1558	0.30354	0.06058	0.000	220.032	0.696E-07	0.004	37.7
6019	48.818	222.702	23.1803	0.27828	0.06060	0.000	220.031	0.666E-07	0.003	39.4
6018	52.785	223.394	23.7716	0.35499	0.06338	0.000	220.092	0.733E-07	0.003	36.5
6017	52.789	223.128	23.7965	0.32842	0.06340	0.000	220.091	0.704E-07	0.002	38.0
6016	52.783	222.866	23.8196	0.30293	0.06344	0.000	220.091	0.661E-07	0.002	40.4
6015	52.784	222.680	23.8369	0.27846	0.06348	0.000	220.115	0.691E-07	0.002	38.6
6014	56.237	223.503	24.2836	0.38265	0.06576	0.000	220.072	0.734E-07	0.003	37.0
6013	56.232	223.250	24.3052	0.35506	0.06578	0.000	220.073	0.725E-07	0.002	37.5
6012	56.230	223.010	24.3262	0.32848	0.06582	0.000	220.071	0.728E-07	0.002	37.3
6011	56.232	222.786	24.3462	0.30297	0.06590	0.000	220.073	0.740E-07	0.003	36.7
6010	59.876	222.553	24.8727	0.38082	0.06840	0.000	219.271	0.734E-07	0.003	37.6
6009	59.876	222.313	24.8934	0.35332	0.06845	0.000	219.272	0.730E-07	0.002	37.8
6008	59.876	222.091	24.9125	0.32687	0.06851	0.000	219.274	0.741E-07	0.002	37.2
6007	59.875	221.882	24.9303	0.30228	0.06843	0.000	219.273	0.743E-07	0.003	37.1
6004	64.382	222.316	25.4668	0.37960	0.07140	0.000	219.150	0.792E-07	0.002	35.6
6005	64.382	222.294	25.4686	0.37930	0.07145	0.000	219.140	0.778E-07	0.002	36.2
6002	64.385	222.111	25.4841	0.35248	0.07148	0.000	219.183	0.776E-07	0.002	36.3
6001	64.383	221.923	25.4995	0.32623	0.07050	0.001	219.216	0.697E-07	0.011	39.8
6003	64.383	221.665	25.5210	0.30064	0.07159	0.000	219.167	0.784E-07	0.003	35.9
6006	64.382	221.622	25.5243	0.30103	0.07164	0.000	219.122	0.788E-07	0.002	35.7

#### Nominal Temperature 273. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K)	Cell Temperature K	Thermal Diffusivity m**2/s	Specific Heat DSTAT J/(mol.K)	
4169	0.213	274.027	0.0935	0.06739	0.01815	0.006	270.179	0.205E-04	0.085
4168	0.213	273.654	0.0936	0.06103	0.01823	0.007	270.180	0.207E-04	0.092
4167	0.213	273.302	0.0939	0.05487	0.01824	0.007	270.183	0.207E-04	0.105
4166	0.213	272.993	0.0942	0.04912	0.01824	0.008	270.186	0.221E-04	0.111
4165	0.569	274.087	0.2509	0.07409	0.01825	0.006	270.178	0.813E-05	0.076
4164	0.569	273.723	0.2512	0.06738	0.01816	0.006	270.178	0.744E-05	0.084
4164	0.569	273.387	0.2515	0.06099	0.01816	0.006	270.178	0.745E-05	0.083
4162	0.569	273.053	0.2522	0.05491	0.01809	0.008	270.180	0.668E-05	0.104
4161	1.352	273.733	0.6016	0.07414	0.01765	0.005	270.172	0.191E-05	0.054
4160	1.353	273.402	0.6025	0.06739	0.01780	0.005	270.176	0.201E-05	0.063

4159	1.353	273.105	0.6032	0.06101	0.01770	0.006	270.176	0.196E-05	0.067	14.7
4158	1.353	272.813	0.6039	0.05490	0.01762	0.006	270.178	0.186E-05	0.075	15.4
4157	1.884	273.900	0.8414	0.08117	0.01759	0.003	270.172	0.115E-05	0.037	17.7
4156	1.884	273.611	0.8423	0.07411	0.01767	0.005	270.173	0.133E-05	0.052	15.3
4155	1.884	273.268	0.8435	0.06739	0.01764	0.005	270.175	0.118E-05	0.053	17.4
4154	1.884	272.978	0.8444	0.06099	0.01772	0.006	270.174	0.127E-05	0.065	16.3
4153	1.884	272.647	0.8455	0.05488	0.01751	0.006	270.178	0.895E-06	0.063	22.7
4152	3.265	273.915	1.4760	0.08852	0.01808	0.003	270.197	0.624E-06	0.034	19.1
4151	3.265	273.602	1.4779	0.08118	0.01803	0.004	270.198	0.599E-06	0.042	19.9
4150	3.266	273.307	1.4800	0.07411	0.01801	0.007	270.198	0.594E-06	0.070	20.0
4149	3.266	272.771	1.4833	0.06124	0.01806	0.005	270.198	0.618E-06	0.057	19.4
4148	4.596	274.264	2.0970	0.10419	0.01845	0.003	270.197	0.380E-06	0.035	22.5
4147	4.596	273.663	2.1024	0.08863	0.01853	0.004	270.197	0.401E-06	0.043	21.4
4146	4.596	273.100	2.1076	0.07422	0.01853	0.004	270.200	0.399E-06	0.039	21.6
4145	4.596	272.611	2.1122	0.06149	0.01837	0.006	270.201	0.383E-06	0.058	22.3
4144	5.953	274.004	2.7479	0.10430	0.01914	0.003	270.196	0.290E-06	0.030	23.4
4143	5.953	273.453	2.7548	0.08864	0.01909	0.003	270.199	0.298E-06	0.033	22.7
4142	5.955	272.919	2.7625	0.07422	0.01925	0.004	270.197	0.317E-06	0.044	21.6
4141	5.955	272.446	2.7685	0.06142	0.01899	0.006	270.203	0.271E-06	0.054	24.9
4140	7.434	274.324	3.4618	0.12126	0.01999	0.002	270.191	0.233E-06	0.022	24.1
4139	7.434	273.767	3.4710	0.10435	0.01989	0.003	270.192	0.233E-06	0.025	24.0
4138	7.435	273.224	3.4805	0.08863	0.01998	0.003	270.194	0.237E-06	0.034	23.7
4137	7.435	272.722	3.4888	0.07422	0.01986	0.006	270.194	0.219E-06	0.054	25.5
4136	9.224	274.587	4.3370	0.13978	0.02101	0.002	270.189	0.181E-06	0.018	26.0
4135	9.224	274.002	4.3496	0.12119	0.02101	0.002	270.191	0.180E-06	0.023	26.1
4134	9.225	273.472	4.3615	0.10427	0.02107	0.003	270.191	0.185E-06	0.027	25.6
4133	9.225	272.989	4.3721	0.08859	0.02070	0.004	270.194	0.163E-06	0.036	28.6
4132	10.598	274.325	5.0246	0.13933	0.02184	0.002	270.164	0.161E-06	0.020	26.2
4131	10.598	273.760	5.0393	0.12121	0.02183	0.002	270.166	0.152E-06	0.022	27.8
4130	10.599	273.271	5.0526	0.10427	0.02187	0.003	270.166	0.159E-06	0.028	26.6
4129	10.599	272.806	5.0648	0.08868	0.02148	0.004	270.169	0.137E-06	0.037	30.5
4128	11.979	274.139	5.7184	0.14018	0.02279	0.002	270.202	0.139E-06	0.019	27.9
4127	11.981	273.608	5.7353	0.12130	0.02277	0.002	270.204	0.137E-06	0.020	28.4
4126	11.983	273.140	5.7507	0.10437	0.02279	0.003	270.205	0.140E-06	0.032	27.7
4125	11.985	272.690	5.7657	0.08863	0.02256	0.005	270.209	0.125E-06	0.049	30.8
4124	13.452	274.415	6.4423	0.15899	0.02382	0.002	270.198	0.125E-06	0.016	28.8
4123	13.453	273.900	6.4610	0.13952	0.02390	0.002	270.202	0.128E-06	0.021	28.3
4122	13.455	273.412	6.4791	0.12121	0.02383	0.003	270.202	0.124E-06	0.023	29.1
4121	13.456	272.969	6.4956	0.10424	0.02368	0.003	270.204	0.119E-06	0.030	30.1
4120	14.873	274.216	7.1530	0.15894	0.02490	0.002	270.220	0.117E-06	0.018	29.1
4119	14.875	273.731	7.1730	0.13947	0.02486	0.002	270.220	0.116E-06	0.020	29.3
4118	14.876	273.273	7.1921	0.12119	0.02488	0.003	270.221	0.117E-06	0.024	29.0
4117	14.879	272.834	7.2110	0.10429	0.02471	0.003	270.233	0.103E-06	0.030	32.9
4116	16.451	274.205	7.9252	0.16920	0.02608	0.002	270.193	0.106E-06	0.016	30.4
4115	16.452	273.732	7.9467	0.14905	0.02607	0.002	270.195	0.106E-06	0.021	30.3
4114	16.452	273.076	7.9767	0.12121	0.02596	0.003	270.196	0.103E-06	0.025	31.0
4113	16.454	272.683	7.9953	0.10429	0.02615	0.003	270.196	0.113E-06	0.030	28.6
4112	18.017	273.981	8.6893	0.16913	0.02724	0.002	270.198	0.942E-07	0.017	32.6
4110	18.020	273.549	8.7120	0.14909	0.02715	0.002	270.201	0.946E-07	0.019	32.4
4111	18.020	272.934	8.7429	0.12123	0.02722	0.004	270.201	0.997E-07	0.031	30.8
4109	18.020	272.521	8.7637	0.10428	0.02698	0.003	270.202	0.838E-07	0.029	36.3
4108	19.476	273.832	9.3838	0.16922	0.02843	0.002	270.208	0.939E-07	0.016	31.7
4107	19.477	273.405	9.4073	0.14907	0.02830	0.002	270.207	0.917E-07	0.020	32.3
4106	19.477	272.806	9.4398	0.12122	0.02831	0.003	270.208	0.914E-07	0.027	32.4
4105	19.478	272.431	9.4610	0.10427	0.02789	0.004	270.209	0.784E-07	0.036	37.2
4104	21.274	274.298	10.1793	0.20192	0.02976	0.002	270.190	0.900E-07	0.016	31.9
4103	21.275	273.625	10.2188	0.16926	0.02981	0.002	270.192	0.892E-07	0.018	32.2
4102	21.276	273.216	10.2434	0.14908	0.02976	0.002	270.193	0.878E-07	0.019	32.6
4101	21.278	272.633	10.2783	0.12123	0.02947	0.003	270.190	0.775E-07	0.024	36.6
4100	22.768	274.138	10.8472	0.20185	0.03094	0.002	270.214	0.856E-07	0.015	32.8
4099	22.768	273.500	10.8866	0.16924	0.03096	0.002	270.215	0.851E-07	0.019	33.0
4098	22.768	273.112	10.9109	0.14909	0.03094	0.003	270.215	0.851E-07	0.022	32.9
4097	22.768	272.573	10.9446	0.12124	0.03054	0.003	270.218	0.773E-07	0.028	35.8
4096	24.343	274.438	11.4978	0.22527	0.03224	0.002	270.241	0.850E-07	0.017	32.5
4095	24.342	274.002	11.5254	0.20197	0.03224	0.002	270.241	0.845E-07	0.017	32.6
4094	24.342	273.411	11.5637	0.16931	0.03216	0.002	270.248	0.849E-07	0.018	32.4
4093	24.341	273.029	11.5882	0.14910	0.03222	0.002	270.262	0.821E-07	0.022	33.5
4092	26.041	274.249	12.2021	0.22512	0.03350	0.002	270.229	0.823E-07	0.015	32.9
4091	26.041	273.834	12.2300	0.20190	0.03344	0.002	270.232	0.806E-07	0.018	33.5
4090	26.042	273.248	12.2701	0.16921	0.03349	0.002	270.233	0.806E-07	0.018	33.5
4089	26.042	272.877	12.2954	0.14911	0.03324	0.003	270.229	0.743E-07	0.025	36.0
4084	27.611	274.056	12.8274	0.22511	0.03465	0.002	270.195	0.784E-07	0.017	34.0

4083	27.613	273.662	12.8556	0.20206	0.03460	0.002	270.199	0.768E-07	0.016	34.7
4087	27.610	273.099	12.8938	0.15921	0.03469	0.002	270.193	0.794E-07	0.020	33.6
4088	27.610	273.096	12.8939	0.16918	0.03463	0.002	270.190	0.788E-07	0.019	33.8
4085	27.611	273.095	12.8944	0.16917	0.03465	0.002	270.195	0.778E-07	0.020	34.2
4082	27.613	273.105	12.8945	0.16927	0.03464	0.002	270.198	0.788E-07	0.019	33.8
4086	27.611	273.092	12.8946	0.16917	0.03466	0.002	270.193	0.778E-07	0.018	34.2
4081	27.615	272.771	12.9187	0.14914	0.03431	0.003	270.199	0.757E-07	0.024	34.8
4080	29.060	273.959	13.3750	0.22524	0.03573	0.002	270.220	0.772E-07	0.016	34.2
4079	29.060	273.580	13.4020	0.20190	0.03567	0.002	270.222	0.773E-07	0.017	34.1
4078	29.061	273.037	13.4412	0.16929	0.03571	0.003	270.225	0.771E-07	0.023	34.2
4077	29.063	272.702	13.4562	0.14913	0.03538	0.003	270.226	0.716E-07	0.024	36.4
4076	30.612	274.415	13.8967	0.26269	0.03704	0.002	270.188	0.801E-07	0.015	32.9
4075	30.612	273.803	13.9410	0.22529	0.03689	0.002	270.188	0.760E-07	0.015	34.5
4074	30.612	273.418	13.9589	0.20199	0.03685	0.002	270.189	0.731E-07	0.016	35.8
4073	30.613	272.917	14.0057	0.16934	0.03663	0.002	270.196	0.728E-07	0.021	35.7
4072	31.857	274.345	14.3278	0.26257	0.03784	0.002	270.221	0.785E-07	0.015	33.3
4071	31.857	273.762	14.3705	0.22516	0.03772	0.002	270.222	0.771E-07	0.016	33.8
4070	31.858	273.384	14.3987	0.20199	0.03781	0.002	270.223	0.757E-07	0.016	34.4
4069	31.858	272.877	14.4361	0.16929	0.03763	0.003	270.225	0.734E-07	0.024	35.3
4068	33.310	274.224	14.8142	0.26261	0.03881	0.002	270.223	0.756E-07	0.016	34.4
4067	33.310	273.669	14.8552	0.22521	0.03883	0.002	270.225	0.777E-07	0.016	33.4
4066	33.310	273.293	14.8831	0.20191	0.03894	0.002	270.227	0.753E-07	0.018	34.5
4065	33.310	272.801	14.9197	0.16930	0.03881	0.003	270.228	0.740E-07	0.023	34.9
4064	34.671	274.121	15.2503	0.26264	0.03969	0.002	270.222	0.735E-07	0.014	35.1
4063	34.671	273.564	15.2918	0.22521	0.03972	0.002	270.224	0.731E-07	0.015	35.3
4062	34.671	273.234	15.3167	0.20189	0.03970	0.002	270.228	0.750E-07	0.017	34.4
4061	34.672	272.725	15.3552	0.16928	0.03963	0.002	270.226	0.695E-07	0.020	36.9
4060	36.244	274.029	15.7311	0.26262	0.04086	0.002	270.219	0.769E-07	0.017	33.6
4059	36.244	273.478	15.7723	0.22521	0.04074	0.002	270.220	0.735E-07	0.016	34.9
4058	36.246	273.121	15.8000	0.20188	0.04084	0.002	270.221	0.711E-07	0.018	36.2
4057	36.247	272.661	15.8350	0.16927	0.04083	0.003	270.224	0.720E-07	0.022	35.6
4056	37.920	273.921	16.2203	0.26258	0.04178	0.001	270.220	0.729E-07	0.012	35.1
4055	37.918	273.398	16.2590	0.22519	0.04184	0.002	270.221	0.742E-07	0.016	34.5
4054	37.918	273.046	16.2856	0.20194	0.04188	0.002	270.220	0.704E-07	0.021	36.4
4053	37.917	272.579	16.3206	0.16927	0.04155	0.003	270.219	0.649E-07	0.022	39.1
4052	39.356	273.822	16.6215	0.26263	0.04260	0.002	270.216	0.691E-07	0.013	36.9
4051	39.356	273.331	16.6583	0.22530	0.04295	0.002	270.218	0.771E-07	0.017	33.3
4050	39.356	272.997	16.6835	0.20210	0.04293	0.002	270.217	0.745E-07	0.020	34.4
4049	39.356	272.552	16.7171	0.16931	0.04219	0.003	270.227	0.643E-07	0.024	39.1
4048	41.321	274.069	17.1160	0.28926	0.04414	0.001	270.214	0.724E-07	0.013	35.5
4047	41.320	273.724	17.1414	0.26270	0.04416	0.001	270.216	0.736E-07	0.013	34.8
4046	41.321	273.237	17.1782	0.22527	0.04413	0.002	270.219	0.750E-07	0.015	34.1
4045	41.321	272.886	17.2046	0.20193	0.04404	0.002	270.223	0.659E-07	0.017	38.7
4044	43.136	273.953	17.5737	0.28915	0.04531	0.001	270.210	0.708E-07	0.011	36.3
4043	43.136	273.610	17.5992	0.26265	0.04536	0.002	270.211	0.713E-07	0.013	36.0
4042	43.136	273.131	17.6350	0.22527	0.04548	0.002	270.213	0.730E-07	0.017	35.2
4041	43.136	272.838	17.6570	0.20193	0.04483	0.002	270.213	0.673E-07	0.020	37.6
4040	45.307	273.864	18.0890	0.28917	0.04681	0.002	270.214	0.748E-07	0.014	34.5
4039	45.309	273.520	18.1149	0.26266	0.04673	0.001	270.214	0.721E-07	0.012	35.7
4038	45.309	273.047	18.1499	0.22524	0.04700	0.002	270.216	0.746E-07	0.018	34.6
4037	45.310	272.758	18.1717	0.20200	0.04640	0.002	270.216	0.685E-07	0.019	37.2
4036	47.397	273.763	18.5592	0.28924	0.04821	0.001	270.217	0.750E-07	0.012	34.6
4035	47.396	273.440	18.5826	0.26269	0.04812	0.002	270.219	0.739E-07	0.014	35.0
4034	47.397	272.976	18.6170	0.22526	0.04825	0.002	270.221	0.740E-07	0.016	34.9
4033	47.396	272.688	18.6381	0.20197	0.04746	0.002	270.222	0.646E-07	0.018	39.3
4032	49.265	273.666	18.9591	0.28922	0.04929	0.001	270.205	0.736E-07	0.011	35.2
4031	49.263	273.381	18.9795	0.26268	0.04931	0.002	270.208	0.793E-07	0.014	32.7
4030	49.264	272.912	19.0140	0.22526	0.04935	0.002	270.211	0.754E-07	0.016	34.4
4029	49.264	272.608	19.0363	0.20198	0.04889	0.002	270.210	0.653E-07	0.020	39.3
4024	51.136	274.102	19.3034	0.33149	0.05034	0.001	270.207	0.752E-07	0.011	34.6
4023	51.137	273.598	19.3401	0.28924	0.05038	0.001	270.208	0.742E-07	0.012	35.0
4026	51.136	273.284	19.3626	0.26267	0.05048	0.002	270.204	0.757E-07	0.014	34.4
4025	51.136	273.282	19.3626	0.26269	0.05052	0.002	270.204	0.758E-07	0.014	34.4
4028	51.135	273.269	19.3635	0.26276	0.05062	0.002	270.202	0.747E-07	0.014	35.0
4022	51.137	273.273	19.3636	0.26276	0.05046	0.002	270.210	0.722E-07	0.014	36.0
4027	51.136	273.267	19.3639	0.26270	0.05055	0.002	270.203	0.734E-07	0.013	35.5
4021	51.135	272.824	19.3958	0.22528	0.05053	0.002	270.210	0.706E-07	0.018	36.9
4020	53.905	273.987	19.8383	0.33159	0.05210	0.001	270.215	0.764E-07	0.010	34.3
4019	53.906	273.501	19.8731	0.28945	0.05224	0.002	270.216	0.766E-07	0.013	34.3
4018	53.904	273.189	19.8950	0.26276	0.05228	0.002	270.217	0.751E-07	0.016	35.0
4017	53.904	272.757	19.9260	0.22537	0.05235	0.002	270.217	0.740E-07	0.018	35.5
4016	57.467	274.053	20.4640	0.36105	0.05429	0.001	270.106	0.773E-07	0.010	34.3

4015	57.468	273.728	20.4868	0.33133	0.05431	0.001	270.111	0.768E-07	0.011	34.5
4014	57.466	273.259	20.5194	0.28919	0.05439	0.002	270.111	0.758E-07	0.014	34.9
4013	57.466	272.965	20.5401	0.26261	0.05437	0.001	270.114	0.741E-07	0.013	35.7
4012	60.784	273.914	21.0187	0.36096	0.05620	0.001	270.090	0.790E-07	0.012	33.8
4011	60.782	273.601	21.0400	0.33126	0.05627	0.001	270.092	0.797E-07	0.013	33.5
4010	60.785	273.140	21.0725	0.28923	0.05633	0.002	270.096	0.766E-07	0.016	34.9
4009	60.789	272.866	21.0920	0.26253	0.05628	0.002	270.098	0.771E-07	0.018	34.6
4008	64.310	273.791	21.5679	0.36098	0.05828	0.001	270.100	0.797E-07	0.011	33.9
4007	64.309	273.483	21.5886	0.33125	0.05829	0.001	270.103	0.785E-07	0.013	34.4
4006	64.307	273.071	21.6163	0.28908	0.05841	0.002	270.108	0.824E-07	0.016	32.8
4005	64.304	272.804	21.6340	0.26257	0.05815	0.002	270.109	0.802E-07	0.016	33.5
4004	67.469	273.687	22.0292	0.36099	0.05995	0.001	270.101	0.791E-07	0.012	34.4
4003	67.469	273.393	22.0488	0.33134	0.06010	0.001	270.105	0.801E-07	0.012	34.1
4002	67.467	272.987	22.0758	0.28910	0.06017	0.002	270.111	0.821E-07	0.015	33.2
4001	67.469	272.723	22.0936	0.26259	0.06037	0.002	270.117	0.828E-07	0.016	33.0

### Nominal Temperature 302. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)		
2140	0.282	301.214	0.1127	0.05440	0.02047	0.123	298.459	0.291E-04	1.772	6.2
2139	0.282	300.509	0.1129	0.03999	0.02113	0.195	298.461	0.512E-04	2.900	3.6
2138	0.282	299.696	0.1132	0.02778	0.02044	0.295	298.461	0.308E-04	4.244	5.8
2137	0.290	302.259	0.1156	0.07097	0.01970	0.077	298.525	0.228E-04	1.093	7.3
2136	0.290	301.313	0.1160	0.05437	0.02028	0.113	298.526	0.324E-04	1.636	5.3
2135	0.290	300.565	0.1163	0.03998	0.01981	0.185	298.527	0.224E-04	2.600	7.5
2134	0.925	302.822	0.3694	0.08981	0.01933	0.048	298.524	0.467E-05	0.604	10.9
2133	0.925	301.876	0.3706	0.07101	0.01926	0.067	298.525	0.475E-05	0.842	10.7
2132	0.926	301.076	0.3719	0.05442	0.01900	0.113	298.528	0.448E-05	1.414	11.2
2131	0.926	300.373	0.3728	0.04001	0.01922	0.170	298.527	0.571E-05	2.169	8.9
2130	2.849	303.109	1.1478	0.11087	0.01902	0.004	298.528	0.872E-06	0.043	18.5
2129	2.849	302.212	1.1515	0.08985	0.01892	0.005	298.529	0.768E-06	0.057	20.9
2128	2.849	301.449	1.1547	0.07105	0.01916	0.006	298.527	0.901E-06	0.066	18.1
2127	2.849	300.790	1.1574	0.05442	0.01795	0.010	298.534	0.514E-06	0.099	29.8
2126	4.431	302.740	1.8016	0.11089	0.01954	0.002	298.554	0.472E-06	0.025	22.4
2125	4.431	301.956	1.8069	0.08987	0.01955	0.003	298.555	0.496E-06	0.035	21.4
2124	4.432	301.241	1.8120	0.07106	0.01955	0.005	298.556	0.481E-06	0.053	22.1
2123	4.432	300.644	1.8161	0.05443	0.01888	0.007	298.555	0.394E-06	0.069	26.1
2122	6.312	302.454	2.5898	0.11092	0.02031	0.002	298.561	0.347E-06	0.025	22.1
2121	6.312	301.700	2.5975	0.08990	0.02033	0.004	298.562	0.332E-06	0.037	23.1
2120	6.312	301.094	2.6037	0.07108	0.01939	0.006	298.561	0.260E-06	0.059	28.2
2119	6.315	300.476	2.6111	0.05444	0.02047	0.007	298.565	0.371E-06	0.072	20.9
2118	7.850	302.225	3.2419	0.11095	0.02104	0.003	298.574	0.267E-06	0.026	23.8
2117	7.851	301.543	3.2514	0.08991	0.02100	0.003	298.576	0.270E-06	0.034	23.5
2116	7.851	300.943	3.2593	0.07108	0.02028	0.006	298.576	0.213E-06	0.055	28.7
2115	7.851	300.360	3.2671	0.05445	0.02092	0.007	298.576	0.245E-06	0.070	25.8
2114	9.573	302.720	3.9655	0.13417	0.02146	0.002	298.579	0.183E-06	0.023	28.8
2113	9.573	302.004	3.9774	0.11095	0.02194	0.003	298.581	0.220E-06	0.029	24.6
2112	9.573	301.379	3.9879	0.08992	0.02172	0.004	298.583	0.214E-06	0.034	25.0
2111	9.573	300.802	3.9977	0.07108	0.02122	0.006	298.586	0.179E-06	0.056	29.2
2110	10.974	302.546	4.5639	0.13425	0.02263	0.002	298.575	0.200E-06	0.020	24.2
2109	10.974	301.837	4.5781	0.11101	0.02265	0.003	298.577	0.189E-06	0.026	25.6
2108	10.974	301.239	4.5899	0.08997	0.02254	0.004	298.575	0.196E-06	0.035	24.7
2107	10.974	300.651	4.6016	0.07108	0.02266	0.006	298.576	0.181E-06	0.056	26.9
2106	12.339	302.325	5.1484	0.13425	0.02342	0.002	298.569	0.168E-06	0.020	26.5
2105	12.339	301.694	5.1627	0.11103	0.02340	0.003	298.570	0.175E-06	0.028	25.5
2104	12.339	301.103	5.1761	0.08999	0.02350	0.004	298.570	0.182E-06	0.040	24.6
2103	12.339	300.587	5.1879	0.07114	0.02337	0.005	298.581	0.175E-06	0.046	25.4
2102	14.449	302.760	6.0274	0.15971	0.02450	0.002	298.573	0.143E-06	0.018	27.8
2101	14.449	302.101	6.0453	0.13427	0.02462	0.002	298.575	0.150E-06	0.023	26.6
2100	14.449	301.479	6.0623	0.11103	0.02446	0.003	298.576	0.137E-06	0.027	29.0
2099	14.449	300.945	6.0769	0.08997	0.02449	0.004	298.578	0.146E-06	0.038	27.3
2098	16.464	302.511	6.8734	0.15981	0.02573	0.002	298.565	0.130E-06	0.018	28.1
2097	16.464	301.893	6.8929	0.13436	0.02575	0.002	298.567	0.134E-06	0.020	27.4
2096	16.464	301.325	6.9109	0.11107	0.02570	0.003	298.568	0.135E-06	0.028	27.1
2095	16.464	300.828	6.9268	0.09001	0.02418	0.008	298.569	0.883E-07	0.071	39.1
2094	18.550	302.324	7.7332	0.15979	0.02701	0.002	298.619	0.116E-06	0.017	29.5
2093	18.551	301.726	7.7547	0.13433	0.02704	0.002	298.620	0.115E-06	0.022	29.8
2092	18.551	301.242	7.7722	0.11107	0.02632	0.004	298.622	0.110E-06	0.037	30.4
2091	18.551	300.705	7.7917	0.09001	0.02684	0.004	298.621	0.111E-06	0.038	30.8

2090	21.396	302.168	8.8689	0.15983	0.02814	0.002	298.674	0.101E-06	0.017	30.8
2089	21.395	301.570	8.8933	0.13430	0.02841	0.003	298.674	0.983E-07	0.022	32.1
2088	21.395	301.120	8.9120	0.11104	0.02822	0.003	298.673	0.110E-06	0.028	28.6
2087	21.394	300.619	8.9326	0.08993	0.02784	0.005	298.675	0.852E-07	0.046	36.3
2086	23.049	302.552	9.4864	0.18751	0.02970	0.002	298.677	0.998E-07	0.016	30.9
2085	23.050	302.005	9.5109	0.15986	0.02974	0.002	298.677	0.107E-06	0.019	28.9
2084	23.050	301.431	9.5364	0.13438	0.02980	0.002	298.676	0.959E-07	0.021	32.2
2083	23.051	301.014	9.5554	0.11115	0.02885	0.004	298.694	0.869E-07	0.033	34.4
2082	25.149	302.311	10.2763	0.18752	0.03099	0.002	298.662	0.869E-07	0.016	34.2
2081	25.149	301.774	10.3018	0.15987	0.03105	0.002	298.663	0.881E-07	0.018	33.8
2080	25.149	301.309	10.3240	0.13442	0.03109	0.003	298.665	0.970E-07	0.029	30.7
2079	25.149	300.826	10.3475	0.11106	0.03106	0.004	298.666	0.878E-07	0.032	33.9
2078	27.467	302.722	11.0800	0.21740	0.03262	0.001	298.657	0.950E-07	0.013	30.5
2077	27.467	302.149	11.1092	0.18744	0.03254	0.002	298.659	0.902E-07	0.016	32.1
2076	27.467	301.623	11.1358	0.15978	0.03267	0.002	298.657	0.910E-07	0.020	31.9
2075	27.467	301.125	11.1611	0.13430	0.03263	0.003	298.656	0.835E-07	0.025	34.7
2074	29.624	302.721	11.8110	0.21751	0.03390	0.002	298.814	0.938E-07	0.014	30.2
2073	29.623	302.183	11.8392	0.18765	0.03380	0.002	298.815	0.912E-07	0.017	31.0
2072	29.620	301.692	11.8645	0.15995	0.03397	0.002	298.816	0.961E-07	0.020	29.5
2071	29.620	301.235	11.8888	0.13443	0.03349	0.003	298.816	0.863E-07	0.027	32.4
2070	31.772	302.566	12.5136	0.21751	0.03520	0.002	298.812	0.923E-07	0.015	30.1
2069	31.772	302.069	12.5409	0.18762	0.03520	0.002	298.814	0.961E-07	0.017	28.9
2068	31.771	301.580	12.5677	0.15994	0.03519	0.002	298.813	0.936E-07	0.022	29.7
2067	31.770	301.145	12.5914	0.13445	0.03518	0.003	298.815	0.945E-07	0.028	29.4
2066	33.875	302.436	13.1683	0.21754	0.03657	0.002	298.810	0.946E-07	0.015	29.1
2065	33.875	301.939	13.1965	0.18766	0.03647	0.002	298.812	0.923E-07	0.019	29.7
2064	33.875	301.481	13.2225	0.15997	0.03644	0.003	298.813	0.927E-07	0.022	29.5
2063	33.873	301.055	13.2462	0.13448	0.03649	0.003	298.814	0.926E-07	0.029	29.6
2062	36.015	302.796	13.7743	0.24973	0.03784	0.002	298.814	0.876E-07	0.013	31.0
2061	36.017	302.291	13.8039	0.21762	0.03761	0.002	298.815	0.843E-07	0.014	32.0
2060	36.019	301.840	13.8307	0.18773	0.03770	0.002	298.817	0.916E-07	0.017	29.5
2059	36.022	301.364	13.8592	0.16006	0.03783	0.003	298.819	0.855E-07	0.024	31.7
2058	38.584	302.663	14.4930	0.24970	0.03936	0.001	298.835	0.874E-07	0.013	30.8
2057	38.584	302.163	14.5225	0.21759	0.03921	0.002	298.834	0.835E-07	0.015	32.1
2056	38.585	301.717	14.5492	0.18770	0.03924	0.002	298.836	0.859E-07	0.020	31.2
2055	38.588	301.300	14.5747	0.16001	0.03934	0.003	298.839	0.889E-07	0.023	30.2
2054	40.775	302.541	15.0733	0.24972	0.04060	0.002	298.842	0.853E-07	0.014	31.3
2053	40.776	302.063	15.1020	0.21763	0.04047	0.002	298.839	0.830E-07	0.015	32.1
2052	40.776	301.637	15.1275	0.18775	0.04065	0.002	298.842	0.892E-07	0.019	30.0
2051	40.776	301.225	15.1523	0.16002	0.04045	0.003	298.843	0.861E-07	0.022	30.9
2050	42.821	302.408	15.5902	0.24977	0.04188	0.002	298.836	0.827E-07	0.014	32.3
2049	42.820	301.976	15.6160	0.21765	0.04177	0.002	298.836	0.866E-07	0.016	30.7
2048	42.819	301.547	15.6416	0.18777	0.04175	0.002	298.837	0.866E-07	0.020	30.7
2047	42.818	301.149	15.6656	0.16005	0.04188	0.003	298.839	0.884E-07	0.027	30.1
2046	44.891	302.321	16.0861	0.24982	0.04312	0.002	298.830	0.865E-07	0.014	30.8
2045	44.891	301.866	16.1138	0.21768	0.04299	0.002	298.830	0.833E-07	0.017	31.9
2044	44.892	301.459	16.1386	0.18775	0.04307	0.002	298.835	0.856E-07	0.020	31.0
2043	44.891	301.068	16.1623	0.16004	0.04311	0.003	298.834	0.853E-07	0.024	31.1
2042	47.308	302.668	16.6095	0.28408	0.04430	0.001	298.835	0.815E-07	0.013	32.6
2041	47.308	302.221	16.6366	0.24978	0.04437	0.002	298.837	0.850E-07	0.014	31.2
2040	47.308	301.766	16.6643	0.21765	0.04456	0.002	298.838	0.833E-07	0.017	32.0
2039	47.307	301.396	16.6867	0.18773	0.04403	0.002	298.838	0.836E-07	0.021	31.5
2038	49.787	302.580	17.1434	0.28409	0.04581	0.001	298.846	0.859E-07	0.012	30.9
2037	49.787	302.113	17.1716	0.24980	0.04585	0.002	298.846	0.835E-07	0.015	31.9
2036	49.788	301.690	17.1975	0.21768	0.04586	0.002	298.847	0.827E-07	0.018	32.1
2035	49.787	301.304	17.2209	0.18776	0.04598	0.002	298.847	0.855E-07	0.021	31.1
2034	52.320	302.606	17.6530	0.28428	0.04717	0.001	298.994	0.831E-07	0.011	32.0
2033	52.322	302.165	17.6800	0.24994	0.04695	0.002	298.993	0.794E-07	0.016	33.3
2032	52.321	301.764	17.7042	0.21778	0.04721	0.002	298.992	0.847E-07	0.019	31.4
2031	52.321	301.388	17.7271	0.18785	0.04723	0.002	298.995	0.856E-07	0.021	31.0
2030	54.745	302.602	18.1178	0.29142	0.04858	0.001	298.999	0.845E-07	0.013	31.6
2029	54.745	302.096	18.1482	0.24994	0.04866	0.002	299.000	0.867E-07	0.016	30.8
2028	54.744	301.687	18.1728	0.21782	0.04840	0.003	299.000	0.803E-07	0.022	33.1
2027	54.744	301.319	18.1950	0.18789	0.04863	0.003	298.999	0.841E-07	0.024	31.7
2026	56.927	302.505	18.5221	0.29145	0.04970	0.001	298.999	0.815E-07	0.013	32.8
2025	56.927	302.008	18.5520	0.24995	0.04983	0.002	299.000	0.834E-07	0.016	32.1
2024	56.928	301.695	18.5710	0.22406	0.04979	0.002	298.999	0.827E-07	0.019	32.3
2023	56.927	301.273	18.5963	0.18788	0.04937	0.003	299.001	0.804E-07	0.025	32.9
2022	58.866	302.812	18.8438	0.32086	0.05057	0.001	299.001	0.847E-07	0.012	31.6
2021	58.867	301.967	18.8944	0.24999	0.05085	0.002	299.002	0.872E-07	0.017	30.8
2020	58.867	301.653	18.9133	0.22409	0.05079	0.002	299.002	0.847E-07	0.019	31.6
2019	58.867	301.221	18.9392	0.18789	0.05073	0.003	299.000	0.836E-07	0.025	32.0

2018	61.171	302.725	19.2370	0.32087	0.05190	0.001	299.001	0.863E-07	0.012	31.2
2017	61.171	301.891	19.2865	0.24997	0.05221	0.002	299.004	0.874E-07	0.018	30.9
2016	61.171	301.576	19.3053	0.22409	0.05209	0.002	299.004	0.816E-07	0.017	33.0
2015	61.171	301.184	19.3288	0.18784	0.05195	0.003	299.004	0.869E-07	0.025	30.9
2014	63.276	302.639	19.5821	0.32092	0.05295	0.001	298.993	0.854E-07	0.012	31.6
2013	63.275	301.832	19.6295	0.25000	0.05327	0.002	298.992	0.894E-07	0.016	30.3
2012	63.272	301.534	19.6467	0.22412	0.05331	0.002	298.995	0.882E-07	0.018	30.7
2011	63.272	301.105	19.6721	0.18792	0.05319	0.003	298.993	0.815E-07	0.024	33.1
2010	65.448	303.061	19.8948	0.36772	0.05423	0.001	298.988	0.845E-07	0.010	32.2
2009	65.449	302.567	19.9238	0.32095	0.05428	0.001	298.992	0.889E-07	0.012	30.6
2008	65.448	302.235	19.9431	0.29156	0.05428	0.002	298.992	0.879E-07	0.015	30.9
2007	65.448	301.773	19.9703	0.25005	0.05435	0.002	298.991	0.888E-07	0.017	30.6
2006	65.448	301.470	19.9881	0.22416	0.05449	0.002	298.992	0.866E-07	0.020	31.4
2005	67.302	303.005	20.1760	0.36764	0.05510	0.001	298.999	0.843E-07	0.009	32.4
2004	67.301	302.497	20.2055	0.32094	0.05512	0.001	298.997	0.850E-07	0.012	32.0
2003	67.301	302.154	20.2255	0.29153	0.05531	0.002	298.996	0.829E-07	0.014	32.9
2002	67.301	301.719	20.2509	0.25007	0.05525	0.002	298.998	0.850E-07	0.018	32.1
2001	67.301	301.436	20.2674	0.22417	0.05529	0.002	298.996	0.859E-07	0.018	31.7

### Nominal Temperature 324. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
3134	0.285	324.650	0.1058	0.05886	0.02115 0.007	321.745	0.225E-04 0.104	8.7
3133	0.286	323.892	0.1062	0.04329	0.02134 0.012	321.748	0.267E-04 0.173	7.5
3132	0.295	323.229	0.1100	0.03010	0.02107 0.019	321.751	0.205E-04 0.272	9.3
3131	0.606	326.291	0.2240	0.09716	0.02124 0.005	321.778	0.110E-04 0.068	8.4
3130	0.607	325.367	0.2248	0.07684	0.02110 0.006	321.783	0.107E-04 0.084	8.6
3129	0.607	324.532	0.2254	0.05889	0.02133 0.007	321.785	0.122E-04 0.100	7.7
3128	0.607	323.808	0.2262	0.04331	0.02113 0.011	321.787	0.110E-04 0.152	8.4
3127	1.343	325.976	0.4978	0.09718	0.02048 0.004	321.789	0.295E-05 0.053	13.6
3126	1.343	325.105	0.4991	0.07684	0.02039 0.005	321.793	0.282E-05 0.065	14.2
3125	1.343	324.328	0.5004	0.05889	0.02062 0.008	321.797	0.311E-05 0.096	13.1
3124	1.343	323.693	0.5014	0.04331	0.01989 0.012	321.808	0.244E-05 0.139	16.1
3123	2.367	325.713	0.8814	0.09721	0.02028 0.004	321.812	0.124E-05 0.040	18.1
3122	2.367	324.900	0.8839	0.07688	0.02012 0.005	321.814	0.114E-05 0.056	19.6
3121	2.367	324.194	0.8859	0.05892	0.02029 0.007	321.816	0.132E-05 0.078	17.1
3120	2.367	323.596	0.8876	0.04333	0.01938 0.011	321.822	0.959E-06 0.126	22.5
3119	3.710	325.480	1.3882	0.09724	0.02048 0.003	321.823	0.716E-06 0.036	20.2
3118	3.709	324.726	1.3915	0.07688	0.02026 0.005	321.827	0.658E-06 0.049	21.8
3117	3.709	324.043	1.3947	0.05893	0.02040 0.007	321.828	0.681E-06 0.077	21.2
3116	3.709	323.459	1.3975	0.04339	0.02018 0.012	321.830	0.596E-06 0.121	24.0
3115	5.306	326.097	1.9899	0.11993	0.02087 0.002	321.861	0.471E-06 0.022	21.7
3114	5.306	325.280	1.9955	0.09724	0.02078 0.003	321.864	0.430E-06 0.034	23.7
3113	5.306	324.572	2.0004	0.07690	0.02094 0.006	321.868	0.466E-06 0.059	22.1
3112	5.306	323.938	2.0048	0.05895	0.02108 0.007	321.871	0.482E-06 0.074	21.6
3111	7.537	325.775	2.8433	0.12003	0.02179 0.003	321.889	0.315E-06 0.027	23.8
3110	7.537	325.053	2.8507	0.09733	0.02178 0.004	321.891	0.324E-06 0.037	23.2
3109	7.537	324.376	2.8576	0.07696	0.02175 0.005	321.896	0.299E-06 0.049	25.1
3108	7.537	323.823	2.8634	0.05898	0.02189 0.007	321.899	0.351E-06 0.069	21.6
3107	8.691	324.815	3.2962	0.11970	0.02223 0.002	321.092	0.265E-06 0.024	24.9
3106	8.692	324.109	3.3050	0.09705	0.02222 0.003	321.097	0.259E-06 0.032	25.6
3105	8.692	322.910	3.3197	0.05880	0.02243 0.008	321.098	0.265E-06 0.076	25.2
3104	11.399	325.249	4.3282	0.14476	0.02327 0.002	321.092	0.197E-06 0.019	26.6
3103	11.399	324.521	4.3403	0.11973	0.02329 0.003	321.093	0.194E-06 0.024	27.2
3102	11.401	323.882	4.3513	0.09707	0.02354 0.004	321.095	0.219E-06 0.041	24.3
3101	11.401	323.332	4.3605	0.07675	0.02216 0.007	321.124	0.134E-06 0.061	37.4
3100	13.592	324.984	5.1675	0.14478	0.02426 0.002	321.080	0.166E-06 0.021	27.8
3099	13.592	324.306	5.1812	0.11976	0.02448 0.003	321.086	0.174E-06 0.026	26.7
3098	13.592	323.683	5.1940	0.09712	0.02455 0.004	321.086	0.171E-06 0.036	27.3
3097	13.592	323.156	5.2049	0.07675	0.02299 0.007	321.091	0.106E-06 0.060	41.4
3096	15.668	324.774	5.9543	0.14480	0.02530 0.002	321.091	0.145E-06 0.020	28.9
3095	15.669	324.141	5.9694	0.11978	0.02535 0.003	321.093	0.148E-06 0.027	28.3
3094	15.668	323.571	5.9829	0.09737	0.02553 0.004	321.119	0.144E-06 0.038	29.2
3093	15.669	323.056	5.9954	0.07677	0.02505 0.006	321.103	0.133E-06 0.056	31.2
3092	17.795	325.228	6.7307	0.17223	0.02648 0.002	321.086	0.133E-06 0.016	29.0
3091	17.795	324.559	6.7489	0.14483	0.02634 0.002	321.089	0.123E-06 0.022	31.1
3090	17.795	323.951	6.7655	0.11978	0.02659 0.003	321.091	0.130E-06 0.028	29.8
3089	17.795	323.433	6.7797	0.09710	0.02544 0.005	321.098	0.977E-07 0.040	38.0
3088	19.831	325.036	7.4748	0.17227	0.02756 0.002	321.103	0.121E-06 0.019	29.9

3087	19.831	324.416	7.4936	0.14486	0.02755	0.002	321.105	0.121E-06	0.022	30.0
3086	19.831	323.834	7.5114	0.11980	0.02762	0.003	321.109	0.119E-06	0.029	30.4
3085	19.831	323.333	7.5267	0.09711	0.02630	0.006	321.112	0.847E-07	0.050	40.8
3084	22.068	324.832	8.2737	0.17227	0.02872	0.002	321.112	0.107E-06	0.018	31.8
3083	22.068	324.224	8.2941	0.14486	0.02870	0.003	321.116	0.102E-06	0.024	33.6
3082	22.068	323.701	8.3118	0.11987	0.02885	0.003	321.117	0.110E-06	0.028	31.2
3081	22.068	323.251	8.3271	0.09717	0.02765	0.005	321.123	0.895E-07	0.042	36.8
3080	24.985	325.290	9.2536	0.20222	0.03003	0.002	321.112	0.108E-06	0.014	29.5
3079	24.985	324.648	9.2777	0.17237	0.03010	0.002	321.115	0.103E-06	0.018	31.0
3078	24.985	324.085	9.2988	0.14492	0.03019	0.002	321.116	0.105E-06	0.022	30.4
3077	24.985	323.578	9.3179	0.11982	0.02899	0.004	321.124	0.780E-07	0.037	39.5
3076	26.686	325.068	9.8224	0.20222	0.03132	0.002	321.113	0.980E-07	0.016	32.1
3075	26.686	324.492	9.8452	0.17241	0.03121	0.002	321.114	0.965E-07	0.016	32.4
3074	26.686	323.955	9.8664	0.14497	0.03152	0.003	321.115	0.104E-06	0.023	30.3
3073	26.686	323.453	9.8865	0.11992	0.03057	0.004	321.127	0.765E-07	0.032	40.1
3072	28.945	324.912	10.5484	0.20231	0.03266	0.002	321.120	0.976E-07	0.016	31.3
3071	28.944	324.371	10.5710	0.17239	0.03101	0.005	321.123	0.685E-07	0.039	42.4
3070	28.942	323.833	10.5929	0.14495	0.03256	0.003	321.124	0.932E-07	0.023	32.7
3069	28.942	323.381	10.6122	0.11985	0.03266	0.004	321.143	0.949E-07	0.033	32.2
3068	31.313	324.420	11.2939	0.20195	0.03395	0.002	320.813	0.910E-07	0.017	32.6
3067	31.312	323.900	11.3168	0.17217	0.03362	0.002	320.815	0.861E-07	0.020	34.1
3066	31.312	323.421	11.3382	0.14476	0.03402	0.003	320.816	0.979E-07	0.027	30.4
3065	31.311	323.000	11.3568	0.11972	0.03300	0.004	320.851	0.759E-07	0.036	38.0
3064	33.677	324.803	11.9679	0.23413	0.03522	0.002	320.793	0.872E-07	0.013	33.3
3063	33.677	324.264	11.9928	0.20221	0.03522	0.002	320.796	0.880E-07	0.016	33.0
3062	33.677	323.754	12.0164	0.17222	0.03539	0.002	320.801	0.914E-07	0.020	31.9
3061	33.676	323.279	12.0385	0.14479	0.03457	0.004	320.804	0.756E-07	0.033	37.7
3060	36.266	324.645	12.6960	0.23417	0.03637	0.002	320.784	0.832E-07	0.014	34.1
3059	36.265	324.108	12.7217	0.20214	0.03678	0.002	320.788	0.881E-07	0.017	32.5
3058	36.266	323.610	12.7458	0.17223	0.03679	0.002	320.792	0.859E-07	0.022	33.3
3057	36.265	323.168	12.7670	0.14478	0.03603	0.004	320.796	0.750E-07	0.036	37.4
3056	38.341	324.505	13.2541	0.23413	0.03766	0.002	320.776	0.836E-07	0.014	33.7
3055	38.341	324.008	13.2784	0.20203	0.03780	0.002	320.776	0.888E-07	0.018	31.8
3053	38.341	323.087	13.3240	0.14482	0.03700	0.004	320.781	0.735E-07	0.032	37.6
3052	40.694	324.350	13.8591	0.23423	0.03896	0.002	320.738	0.846E-07	0.015	33.0
3051	40.694	323.860	13.8837	0.20205	0.03910	0.002	320.737	0.885E-07	0.018	31.6
3050	40.693	323.400	13.9068	0.17225	0.03927	0.003	320.742	0.904E-07	0.023	31.1
3049	40.693	322.998	13.9272	0.14483	0.03933	0.003	320.780	0.862E-07	0.027	32.6
3048	43.223	324.266	14.4742	0.23427	0.04031	0.002	320.748	0.890E-07	0.019	31.1
3047	43.221	323.763	14.4997	0.20211	0.04105	0.002	320.751	0.971E-07	0.021	29.0
3046	43.221	323.336	14.5216	0.17229	0.04113	0.003	320.754	0.103E-06	0.024	27.5
3045	43.221	322.904	14.5437	0.14484	0.03948	0.004	320.757	0.702E-07	0.036	38.5
3044	45.509	324.137	15.0066	0.23429	0.04198	0.002	320.762	0.885E-07	0.016	31.4
3054	45.392	323.518	15.0124	0.17224	0.03792	0.003	320.780	0.867E-07	0.023	29.0
3043	45.510	323.683	15.0302	0.20225	0.04185	0.004	320.765	0.870E-07	0.036	31.8
3042	45.509	323.245	15.0529	0.17236	0.04216	0.003	320.767	0.902E-07	0.026	30.9
3041	45.508	322.848	15.0734	0.14490	0.04234	0.004	320.773	0.908E-07	0.031	30.8
3040	47.770	324.430	15.4878	0.26831	0.04271	0.002	320.679	0.806E-07	0.013	34.0
3039	47.771	323.936	15.5138	0.23382	0.04259	0.002	320.682	0.761E-07	0.015	35.9
3038	47.772	323.474	15.5383	0.20178	0.04281	0.002	320.685	0.753E-07	0.020	36.4
3037	47.774	323.079	15.5593	0.17200	0.04155	0.004	320.688	0.640E-07	0.036	41.6
3036	49.862	324.314	15.9335	0.26838	0.04377	0.001	320.676	0.769E-07	0.013	35.5
3035	49.863	323.849	15.9582	0.23386	0.04370	0.002	320.677	0.762E-07	0.018	35.8
3034	49.863	323.405	15.9817	0.20179	0.04399	0.002	320.681	0.773E-07	0.021	35.5
3033	49.865	323.002	16.0034	0.17203	0.04304	0.003	320.683	0.656E-07	0.023	40.9
3032	52.140	324.223	16.3971	0.26841	0.04494	0.002	320.675	0.776E-07	0.014	35.1
3031	52.142	323.772	16.4213	0.23395	0.04503	0.002	320.681	0.784E-07	0.017	34.8
3030	52.142	323.341	16.4441	0.20182	0.04524	0.003	320.684	0.792E-07	0.022	34.6
3029	52.144	322.949	16.4652	0.17203	0.04373	0.004	320.683	0.626E-07	0.033	42.3
3028	53.908	324.128	16.7445	0.26843	0.04591	0.002	320.661	0.767E-07	0.014	35.6
3027	53.908	323.677	16.7683	0.23391	0.04563	0.002	320.660	0.720E-07	0.017	37.6
3026	53.910	323.261	16.7907	0.20177	0.04607	0.003	320.663	0.769E-07	0.022	35.6
3025	53.910	322.858	16.8122	0.17198	0.04604	0.003	320.661	0.721E-07	0.027	37.9
3024	56.218	324.013	17.1809	0.26846	0.04708	0.002	320.620	0.787E-07	0.014	34.7
3023	56.220	323.583	17.2042	0.23397	0.04712	0.002	320.624	0.791E-07	0.019	34.5
3022	56.220	323.207	17.2241	0.20181	0.04724	0.003	320.660	0.798E-07	0.022	34.2
3021	56.225	322.806	17.2464	0.17207	0.04551	0.004	320.637	0.601E-07	0.032	43.8
3020	58.585	324.050	17.6013	0.26851	0.04808	0.002	320.726	0.786E-07	0.015	34.6
3019	58.588	323.609	17.6253	0.23402	0.04849	0.002	320.729	0.802E-07	0.020	34.2
3018	58.589	323.217	17.6463	0.20186	0.04833	0.003	320.734	0.781E-07	0.022	35.0
3017	58.592	322.864	17.6656	0.17209	0.04751	0.003	320.750	0.682E-07	0.028	39.3
3016	60.563	324.403	17.9220	0.30539	0.04914	0.001	320.711	0.776E-07	0.013	35.2

3015	60.566	323.970	17.9453	0.26853	0.04919	0.002	320.715	0.797E-07	0.015	34.3
3014	60.568	323.552	17.9678	0.23403	0.04930	0.002	320.718	0.808E-07	0.018	33.8
3013	60.571	323.169	17.9887	0.20187	0.04895	0.002	320.721	0.773E-07	0.021	35.1
3012	62.737	324.338	18.2850	0.30535	0.05026	0.002	320.702	0.821E-07	0.014	33.4
3011	62.736	323.902	18.3078	0.26852	0.05029	0.002	320.707	0.818E-07	0.016	33.5
3010	62.737	323.489	18.3297	0.23403	0.05053	0.002	320.710	0.836E-07	0.019	32.9
3009	62.737	323.157	18.3473	0.20181	0.04952	0.003	320.749	0.749E-07	0.023	35.9
3008	65.566	324.236	18.7384	0.30543	0.05148	0.002	320.725	0.754E-07	0.014	36.3
3007	65.560	323.834	18.7587	0.26855	0.05158	0.002	320.735	0.786E-07	0.015	34.9
3006	65.562	323.428	18.7804	0.23403	0.05173	0.002	320.741	0.775E-07	0.019	35.4
3005	65.563	323.079	18.7991	0.20189	0.05130	0.003	320.762	0.728E-07	0.024	37.4
3004	67.911	324.725	19.0688	0.34475	0.05275	0.001	320.829	0.797E-07	0.011	34.6
3003	67.916	324.338	19.0897	0.30556	0.05285	0.002	320.847	0.880E-07	0.014	31.4
3002	67.921	323.876	19.1147	0.26865	0.05293	0.002	320.855	0.787E-07	0.016	35.1
3001	67.926	323.484	19.1359	0.23415	0.05320	0.002	320.872	0.771E-07	0.020	36.0

### 3. Results for Nitrogen.

A total of 1423 points are given in table 2. The physical states covered by these measurements include the dilute gas, the moderately dense gas, the near critical region, the compressed liquid, and the vapor at temperatures below the critical temperature. The equation of state used for nitrogen is given in [17].

Table 2. The thermal conductivity, thermal diffusivity and specific heat of nitrogen

## Nominal Temperature 81. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
22029	1.300	81.155	28.3384	0.35780	0.13809 0.001	79.619	0.698E-07 0.004	70.3
22030	1.321	81.003	28.3659	0.32223	0.13828 0.001	79.624	0.703E-07 0.005	69.8
22031	1.337	80.863	28.3909	0.28878	0.13870 0.001	79.625	0.717E-07 0.006	68.5
22032	1.353	80.724	28.4157	0.25738	0.13894 0.001	79.624	0.707E-07 0.007	69.5
22025	6.677	81.104	28.8227	0.35714	0.14446 0.001	79.613	0.779E-07 0.005	64.8
22026	6.693	80.957	28.8459	0.32199	0.14479 0.001	79.616	0.793E-07 0.006	63.7
22027	6.706	80.818	28.8678	0.28872	0.14507 0.001	79.616	0.792E-07 0.007	63.8
22028	6.719	80.686	28.8886	0.25722	0.14534 0.001	79.618	0.799E-07 0.008	63.3
22021	13.706	81.031	29.3664	0.35666	0.15182 0.001	79.608	0.800E-07 0.005	64.9
22022	13.717	80.889	29.3859	0.32161	0.15217 0.001	79.611	0.802E-07 0.006	64.9
22023	13.727	80.758	29.4039	0.28830	0.15239 0.001	79.612	0.802E-07 0.007	64.9
22024	13.736	80.628	29.4217	0.25685	0.15264 0.001	79.613	0.805E-07 0.008	64.7
22017	21.394	80.959	29.8769	0.35640	0.15915 0.001	79.598	0.819E-07 0.005	65.3
22018	21.408	80.824	29.8935	0.32125	0.15941 0.001	79.603	0.819E-07 0.006	65.4
22019	21.418	80.700	29.9087	0.28795	0.15946 0.001	79.602	0.825E-07 0.007	64.9
22020	21.426	80.576	29.9237	0.25656	0.15959 0.001	79.602	0.804E-07 0.009	66.6
22013	31.117	80.926	30.4272	0.35589	0.16708 0.001	79.603	0.971E-07 0.006	56.7
22014	31.125	80.800	30.4406	0.32107	0.16730 0.001	79.605	0.987E-07 0.007	55.9
22015	31.136	80.675	30.4541	0.28784	0.16737 0.001	79.606	0.983E-07 0.008	56.0
22016	31.142	80.565	30.4658	0.25653	0.16761 0.001	79.606	0.102E-06 0.010	53.9
22009	41.391	80.865	30.9326	0.35539	0.17430 0.001	79.606	0.916E-07 0.006	61.7
22010	41.406	80.739	30.9448	0.32068	0.17463 0.001	79.606	0.914E-07 0.007	61.9
22011	41.421	80.619	30.9565	0.28752	0.17486 0.001	79.608	0.911E-07 0.008	62.1
22012	41.432	80.511	30.9668	0.25624	0.17487 0.001	79.609	0.913E-07 0.009	61.9
22005	53.490	80.819	31.4478	0.35582	0.18243 0.001	79.609	0.910E-07 0.006	63.8
22006	53.506	80.696	31.4583	0.32036	0.18253 0.001	79.614	0.887E-07 0.007	65.5
22007	53.523	80.584	31.4678	0.28641	0.18215 0.001	79.614	0.898E-07 0.008	64.5
22008	53.540	80.478	31.4770	0.25523	0.18219 0.001	79.615	0.885E-07 0.010	65.5
22001	64.948	80.791	31.8750	0.35505	0.18905 0.001	79.606	0.105E-06 0.006	56.7
22002	64.948	80.675	31.8832	0.32020	0.18912 0.001	79.611	0.104E-06 0.007	56.8
22003	64.952	80.566	31.8911	0.28751	0.18925 0.001	79.610	0.105E-06 0.008	56.6
22004	64.956	80.467	31.8981	0.25620	0.18950 0.001	79.611	0.105E-06 0.010	56.3

## Nominal Temperature 92. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
21037	3.368	92.134	26.6521	0.41698	0.11533 0.000	90.055	0.646E-07 0.003	67.9
21041	3.367	92.101	26.6579	0.42989	0.12037 0.000	90.065	0.621E-07 0.003	73.7
21038	3.369	91.920	26.6912	0.37577	0.11570 0.000	90.060	0.646E-07 0.004	67.9
21042	3.367	91.896	26.6954	0.38756	0.12070 0.000	90.068	0.633E-07 0.004	72.3
21039	3.370	91.721	26.7276	0.33673	0.11605 0.000	90.059	0.657E-07 0.004	66.8
21043	3.367	91.701	26.7308	0.34735	0.12108 0.000	90.067	0.636E-07 0.004	72.0
21040	3.371	91.534	26.7618	0.29993	0.11636 0.001	90.061	0.660E-07 0.005	66.5
21044	3.367	91.511	26.7652	0.30938	0.12135 0.001	90.068	0.633E-07 0.005	72.2
21033	7.116	92.020	27.1491	0.42922	0.12589 0.000	90.049	0.682E-07 0.003	68.7
21034	7.128	91.818	27.1836	0.38677	0.12642 0.000	90.050	0.693E-07 0.004	67.8
21035	7.137	91.634	27.2150	0.34706	0.12675 0.000	90.051	0.706E-07 0.004	66.6
21036	7.146	91.455	27.2455	0.30916	0.12702 0.001	90.052	0.704E-07 0.005	66.7
21029	12.457	91.938	27.7387	0.42893	0.13292 0.000	90.052	0.743E-07 0.003	65.1
21030	12.466	91.741	27.7683	0.38654	0.13334 0.000	90.054	0.742E-07 0.004	65.3
21031	12.473	91.564	27.7949	0.34639	0.13370 0.001	90.054	0.756E-07 0.004	64.1
21032	12.480	91.394	27.8206	0.30857	0.13398 0.001	90.055	0.761E-07 0.005	63.7
21025	17.575	91.841	28.2260	0.42830	0.13897 0.000	90.036	0.749E-07 0.003	66.2
21026	17.584	91.656	28.2516	0.38616	0.13937 0.000	90.038	0.759E-07 0.004	65.5
21027	17.594	91.486	28.2752	0.34608	0.13966 0.001	90.040	0.762E-07 0.005	65.3
21028	17.602	91.319	28.2982	0.30844	0.13990 0.001	90.041	0.752E-07 0.006	66.1
21021	24.887	91.762	28.8198	0.42836	0.14681 0.000	90.041	0.799E-07 0.004	64.2
21022	24.893	91.586	28.8415	0.38575	0.14708 0.000	90.045	0.801E-07 0.004	64.1
21023	24.899	91.414	28.8628	0.34575	0.14724 0.001	90.044	0.778E-07 0.005	65.9

21024	24.910	91.261	28.8820	0.30807	0.14745 0.001	90.045	0.785E-07 0.006	65.3
21017	32.391	91.703	29.3441	0.42751	0.15378 0.000	90.039	0.894E-07 0.004	58.9
21018	32.396	91.533	29.3632	0.38579	0.15412 0.001	90.041	0.891E-07 0.005	59.2
21019	32.404	91.376	29.3811	0.34580	0.15429 0.001	90.042	0.904E-07 0.005	58.3
21020	32.410	91.226	29.3979	0.30813	0.15446 0.001	90.043	0.910E-07 0.006	58.0
21013	40.571	91.641	29.8459	0.42738	0.16086 0.000	90.042	0.931E-07 0.004	58.1
21014	40.581	91.481	29.8627	0.38516	0.16109 0.001	90.044	0.946E-07 0.005	57.3
21015	40.588	91.329	29.8786	0.34531	0.16125 0.001	90.045	0.948E-07 0.006	57.1
21016	40.597	91.186	29.8935	0.30774	0.16137 0.001	90.045	0.953E-07 0.007	56.8
21009	49.857	91.576	30.3486	0.42664	0.16796 0.001	90.045	0.959E-07 0.004	57.9
21010	49.862	91.424	30.3630	0.38488	0.16809 0.001	90.047	0.957E-07 0.005	58.0
21011	49.872	91.278	30.3770	0.34534	0.16836 0.001	90.048	0.964E-07 0.006	57.7
21012	49.878	91.135	30.3906	0.30777	0.16861 0.001	90.047	0.952E-07 0.007	58.4
21005	59.017	91.510	30.7909	0.42645	0.17448 0.001	90.037	0.938E-07 0.005	60.6
21006	59.013	91.360	30.8036	0.38456	0.17449 0.001	90.041	0.939E-07 0.005	60.5
21007	59.027	91.216	30.8165	0.34533	0.17474 0.001	90.041	0.925E-07 0.006	61.4
21008	59.030	91.089	30.8276	0.30781	0.17495 0.001	90.041	0.935E-07 0.007	60.8
21001	67.387	91.467	31.1559	0.42601	0.17993 0.001	90.016	0.108E-06 0.005	53.7
21003	67.390	91.183	31.1788	0.34501	0.18022 0.001	90.020	0.107E-06 0.006	54.2
21004	67.384	91.052	31.1890	0.30755	0.18028 0.001	90.020	0.107E-06 0.007	54.2
21002	68.173	91.322	31.1998	0.38457	0.17994 0.001	90.019	0.107E-06 0.005	54.1

#### Nominal Temperature 103. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
18009	0.437	104.350	0.5474	0.04678	0.01033 0.001	100.869	0.655E-06 0.012	26.9
18010	0.437	103.688	0.5519	0.03783	0.01029 0.001	100.870	0.645E-06 0.013	27.3
18011	0.437	103.101	0.5559	0.02988	0.01025 0.002	100.870	0.644E-06 0.016	27.4
18012	0.437	102.576	0.5596	0.02291	0.01024 0.002	100.871	0.649E-06 0.023	27.2
18005	0.632	104.484	0.8253	0.05318	0.01065 0.001	100.867	0.370E-06 0.007	32.3
18006	0.632	103.839	0.8328	0.04358	0.01062 0.001	100.870	0.372E-06 0.010	32.2
18007	0.632	103.260	0.8397	0.03500	0.01059 0.001	100.870	0.376E-06 0.012	31.9
18008	0.632	102.743	0.8460	0.02741	0.01054 0.002	100.870	0.368E-06 0.017	32.5
18001	0.773	103.829	1.0581	0.04658	0.01090 0.001	100.875	0.244E-06 0.008	39.6
18004	0.773	103.446	1.0646	0.04054	0.01091 0.001	100.877	0.249E-06 0.010	39.0
18002	0.773	103.091	1.0707	0.03495	0.01087 0.001	100.875	0.242E-06 0.011	40.0
18003	0.773	102.611	1.0792	0.02738	0.01087 0.002	100.877	0.244E-06 0.016	39.7

#### Nominal Temperature 102. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
17052	1.273	102.296	24.1595	0.40310	0.09712 0.001	100.067	0.530E-07 0.005	77.3
17051	1.265	102.046	24.2174	0.35904	0.09761 0.001	100.067	0.540E-07 0.005	75.9
17050	1.255	101.808	24.2719	0.31769	0.09802 0.001	100.066	0.545E-07 0.006	75.2
17049	1.245	101.589	24.3210	0.27882	0.09831 0.001	100.063	0.549E-07 0.006	74.6
17048	3.062	102.210	24.6030	0.40277	0.10101 0.001	100.060	0.549E-07 0.005	76.0
17047	3.058	101.969	24.6542	0.35873	0.10145 0.001	100.059	0.561E-07 0.005	74.4
17046	3.053	101.744	24.7015	0.31741	0.10190 0.001	100.060	0.574E-07 0.005	72.8
17045	3.047	101.531	24.7461	0.27872	0.10226 0.001	100.057	0.581E-07 0.006	71.9
17044	5.552	102.188	25.1072	0.41154	0.10582 0.001	100.054	0.626E-07 0.005	68.4
17043	5.545	101.951	25.1520	0.36705	0.10624 0.001	100.054	0.632E-07 0.005	67.7
17042	5.536	101.729	25.1933	0.32530	0.10659 0.001	100.052	0.641E-07 0.005	66.8
17041	5.528	101.524	25.2314	0.28605	0.10688 0.001	100.049	0.653E-07 0.006	65.5
17040	8.752	102.189	25.6480	0.42978	0.11121 0.001	100.051	0.664E-07 0.004	66.2
17039	8.747	101.959	25.6872	0.38432	0.11155 0.001	100.051	0.672E-07 0.005	65.4
17038	8.742	101.740	25.7245	0.34151	0.11192 0.001	100.048	0.676E-07 0.005	65.0
17037	8.735	101.537	25.7587	0.30121	0.11211 0.001	100.048	0.687E-07 0.007	63.9
17036	12.309	102.184	26.1597	0.44834	0.11655 0.001	100.043	0.689E-07 0.004	65.4
17035	12.309	101.955	26.1960	0.40187	0.11691 0.001	100.046	0.694E-07 0.005	65.0
17034	12.309	101.743	26.2295	0.35796	0.11722 0.001	100.046	0.704E-07 0.005	64.1
17033	12.309	101.533	26.2626	0.31658	0.11741 0.001	100.042	0.687E-07 0.006	65.6
17032	17.011	102.109	26.7464	0.44797	0.12314 0.001	100.056	0.757E-07 0.004	61.4
17031	17.005	101.888	26.7773	0.40153	0.12342 0.001	100.055	0.755E-07 0.005	61.6
17030	16.998	101.685	26.8055	0.35776	0.12369 0.001	100.055	0.767E-07 0.006	60.7
17029	16.990	101.487	26.8330	0.31639	0.12389 0.001	100.053	0.764E-07 0.007	60.8
17028	21.827	102.090	27.2554	0.46676	0.12905 0.000	100.047	0.766E-07 0.004	62.4

17027	21.823	101.874	27.2835	0.41932	0.12932 0.001	100.048	0.761E-07 0.005	62.8
17026	21.818	101.674	27.3093	0.37454	0.12965 0.001	100.048	0.768E-07 0.006	62.2
17025	21.811	101.487	27.3332	0.33243	0.12989 0.001	100.045	0.770E-07 0.006	62.1
17024	27.567	102.017	27.7904	0.46631	0.13593 0.001	100.046	0.863E-07 0.004	57.1
17023	27.557	101.814	27.8141	0.41899	0.13588 0.001	100.044	0.860E-07 0.005	57.2
17022	27.550	101.624	27.8365	0.37433	0.13619 0.001	100.043	0.882E-07 0.006	55.9
17021	27.542	101.445	27.8576	0.33216	0.13650 0.001	100.043	0.899E-07 0.007	54.8
17020	33.776	102.059	28.2843	0.49556	0.14258 0.000	100.046	0.909E-07 0.004	55.9
17019	33.762	101.859	28.3058	0.44680	0.14228 0.001	100.044	0.900E-07 0.005	56.3
17018	33.752	101.669	28.3264	0.40062	0.14250 0.001	100.044	0.906E-07 0.005	55.9
17017	33.743	101.488	28.3460	0.35695	0.14255 0.001	100.044	0.911E-07 0.006	55.5
17016	41.290	101.992	28.8234	0.49529	0.14908 0.000	100.060	0.936E-07 0.004	55.6
17015	41.230	101.798	28.8396	0.44658	0.14934 0.001	100.058	0.952E-07 0.004	54.7
17014	41.277	101.618	28.8615	0.40042	0.14965 0.001	100.060	0.965E-07 0.005	54.0
17013	41.268	101.442	28.8792	0.35666	0.14969 0.001	100.057	0.970E-07 0.006	53.7
17012	49.085	101.904	29.3204	0.49482	0.15584 0.000	100.057	0.946E-07 0.004	56.5
17011	49.082	101.718	29.3384	0.44617	0.15621 0.001	100.057	0.954E-07 0.005	56.1
17010	49.079	101.544	29.3550	0.40003	0.15637 0.001	100.057	0.956E-07 0.005	56.0
17009	49.070	101.372	29.3713	0.35657	0.15660 0.001	100.054	0.958E-07 0.006	55.9
17008	58.456	101.805	29.8514	0.49444	0.16357 0.001	100.036	0.101E-06 0.004	54.7
17007	58.459	101.635	29.8669	0.44584	0.16362 0.001	100.037	0.102E-06 0.005	54.2
17006	58.454	101.462	29.8823	0.39975	0.16378 0.001	100.035	0.100E-06 0.006	54.8
17005	58.451	101.302	29.8965	0.35632	0.16423 0.001	100.033	0.103E-06 0.007	53.7
17001	67.746	101.890	30.3066	0.54479	0.17002 0.000	99.998	0.104E-06 0.004	54.1
17002	67.746	101.705	30.3223	0.49366	0.17024 0.001	100.000	0.104E-06 0.005	54.0
17003	67.737	101.536	30.3363	0.44519	0.17044 0.001	99.999	0.104E-06 0.005	54.0
17004	67.731	101.370	30.3501	0.39927	0.17056 0.001	100.000	0.104E-06 0.006	54.1

### Nominal Temperature 112. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
19025	0.333	113.201	0.3711	0.04245	0.01109 0.002	110.077	0.112E-05 0.019	25.1
19026	0.333	112.555	0.3736	0.03356	0.01104 0.002	110.079	0.112E-05 0.022	25.3
19027	0.333	111.990	0.3758	0.02575	0.01101 0.002	110.079	0.114E-05 0.025	24.9
19028	0.333	111.492	0.3777	0.01900	0.01096 0.004	110.080	0.113E-05 0.040	25.0
19021	0.475	113.041	0.5422	0.04241	0.01120 0.001	110.082	0.718E-06 0.014	27.3
19022	0.475	112.430	0.5459	0.03353	0.01115 0.002	110.084	0.710E-06 0.017	27.6
19023	0.475	111.893	0.5491	0.02572	0.01112 0.002	110.085	0.728E-06 0.023	26.9
19024	0.475	111.428	0.5520	0.01899	0.01110 0.003	110.085	0.756E-06 0.034	25.9
19017	0.654	113.278	0.7666	0.04888	0.01145 0.001	110.079	0.489E-06 0.011	28.8
19018	0.654	112.661	0.7722	0.03928	0.01142 0.001	110.081	0.494E-06 0.013	28.5
19019	0.654	112.115	0.7773	0.03078	0.01138 0.002	110.081	0.507E-06 0.017	27.8
19020	0.654	111.636	0.7819	0.02334	0.01133 0.002	110.082	0.522E-06 0.023	26.9
19013	0.818	113.093	0.9910	0.04880	0.01172 0.001	110.077	0.353E-06 0.011	31.6
19014	0.818	112.511	0.9986	0.03924	0.01169 0.001	110.078	0.355E-06 0.012	31.5
19015	0.818	111.996	1.0054	0.03075	0.01165 0.002	110.079	0.366E-06 0.016	30.6
19016	0.818	111.547	1.0115	0.02333	0.01163 0.002	110.080	0.391E-06 0.024	28.6
19009	0.995	112.882	1.2523	0.04876	0.01208 0.001	110.067	0.252E-06 0.009	36.3
19010	0.995	112.340	1.2623	0.03921	0.01204 0.001	110.068	0.254E-06 0.012	35.9
19011	0.995	111.859	1.2714	0.03074	0.01203 0.002	110.070	0.262E-06 0.016	34.9
19012	0.995	111.436	1.2796	0.02333	0.01202 0.002	110.069	0.276E-06 0.024	33.1
19005	1.203	112.813	1.5892	0.05206	0.01264 0.001	110.067	0.173E-06 0.008	43.5
19006	1.203	112.300	1.6033	0.04219	0.01264 0.001	110.070	0.178E-06 0.011	42.4
19007	1.203	111.838	1.6163	0.03338	0.01263 0.002	110.069	0.181E-06 0.014	41.7
19008	1.203	111.433	1.6279	0.02564	0.01264 0.002	110.070	0.189E-06 0.021	39.9
19001	1.369	112.927	1.8866	0.05916	0.01326 0.001	110.069	0.125E-06 0.010	53.0
19002	1.369	112.424	1.9054	0.04857	0.01326 0.001	110.071	0.128E-06 0.009	51.6
19003	1.369	111.968	1.9230	0.03908	0.01327 0.001	110.073	0.130E-06 0.012	50.9
19004	1.369	111.562	1.9391	0.03065	0.01325 0.002	110.072	0.132E-06 0.018	50.1

### Nominal Temperature 122. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
20041	0.306	123.125	0.3091	0.04395	0.01254 0.002	120.202	0.150E-05 0.025	25.7
20042	0.306	122.704	0.3102	0.03748	0.01250 0.003	120.204	0.150E-05 0.030	25.8
20043	0.306	122.313	0.3113	0.03154	0.01250 0.003	120.205	0.153E-05 0.030	25.4

20044	0.306	121.956	0.3123	0.02613	0.01244	0.004	120.205	0.149E-05	0.040	26.0
20037	0.556	123.005	0.5789	0.04391	0.01217	0.002	120.204	0.726E-06	0.017	27.7
20038	0.556	122.599	0.5812	0.03746	0.01213	0.002	120.204	0.718E-06	0.019	27.9
20039	0.556	122.230	0.5833	0.03153	0.01213	0.002	120.205	0.749E-06	0.024	26.9
20040	0.556	121.892	0.5853	0.02612	0.01207	0.003	120.214	0.747E-06	0.028	26.8
20033	0.777	122.818	0.8345	0.04387	0.01241	0.001	120.197	0.465E-06	0.014	30.6
20034	0.777	122.439	0.8380	0.03743	0.01240	0.002	120.200	0.469E-06	0.016	30.4
20035	0.777	122.088	0.8411	0.03150	0.01237	0.002	120.198	0.468E-06	0.020	30.4
20036	0.777	121.773	0.8440	0.02611	0.01228	0.003	120.200	0.461E-06	0.028	30.8
20029	1.020	122.839	1.1322	0.04724	0.01278	0.001	120.205	0.324E-06	0.013	33.3
20030	1.020	122.473	1.1371	0.04055	0.01274	0.001	120.207	0.322E-06	0.014	33.5
20031	1.020	122.132	1.1418	0.03437	0.01274	0.002	120.206	0.328E-06	0.019	33.0
20032	1.020	121.820	1.1461	0.02872	0.01269	0.002	120.206	0.324E-06	0.023	33.3
20025	1.255	122.657	1.4468	0.04720	0.01321	0.001	120.200	0.236E-06	0.012	37.1
20026	1.255	122.314	1.4535	0.04052	0.01319	0.002	120.202	0.236E-06	0.015	37.1
20027	1.255	121.994	1.4597	0.03435	0.01318	0.002	120.204	0.236E-06	0.017	37.1
20028	1.255	121.709	1.4654	0.02870	0.01314	0.002	120.204	0.240E-06	0.023	36.5
20021	1.470	122.508	1.7602	0.04718	0.01371	0.001	120.197	0.180E-06	0.010	41.7
20022	1.470	122.190	1.7686	0.04049	0.01370	0.001	120.199	0.184E-06	0.013	40.6
20023	1.470	121.884	1.7768	0.03433	0.01368	0.002	120.198	0.181E-06	0.015	41.2
20024	1.470	121.613	1.7842	0.02869	0.01368	0.002	120.199	0.184E-06	0.020	40.7
20017	1.665	122.360	2.0736	0.04711	0.01425	0.001	120.186	0.150E-06	0.010	44.1
20018	1.665	122.059	2.0841	0.04046	0.01427	0.001	120.187	0.154E-06	0.013	42.8
20019	1.665	121.783	2.0940	0.03431	0.01426	0.002	120.188	0.160E-06	0.016	41.2
20020	1.665	121.526	2.1033	0.02868	0.01425	0.002	120.187	0.165E-06	0.021	40.2
20049	1.817	122.255	2.3402	0.04572	0.01476	0.001	120.303	0.114E-06	0.012	53.4
20050	1.817	121.979	2.3524	0.03925	0.01478	0.002	120.305	0.115E-06	0.016	53.2
20051	1.817	121.724	2.3638	0.03328	0.01475	0.002	120.304	0.112E-06	0.020	54.3
20052	1.817	121.490	2.3745	0.02782	0.01478	0.003	120.306	0.114E-06	0.027	53.4
20013	1.853	122.208	2.4088	0.04707	0.01493	0.001	120.189	0.120E-06	0.011	49.6
20014	1.853	121.844	2.4259	0.04041	0.01564	0.002	120.189	0.120E-06	0.014	52.0
20015	1.853	121.598	2.4377	0.03427	0.01560	0.002	120.190	0.121E-06	0.017	51.6
20016	1.853	121.429	2.4459	0.02866	0.01496	0.002	120.190	0.130E-06	0.021	45.9
20045	2.019	122.066	2.7399	0.04563	0.01566	0.002	120.296	0.853E-07	0.014	64.8
20046	2.019	121.819	2.7550	0.03919	0.01566	0.002	120.299	0.863E-07	0.016	64.0
20047	2.019	121.587	2.7695	0.03325	0.01569	0.002	120.299	0.854E-07	0.021	64.8
20048	2.019	121.375	2.7830	0.02780	0.01573	0.003	120.299	0.881E-07	0.028	62.9
20009	2.120	121.867	2.9705	0.04698	0.01701	0.001	120.181	0.809E-07	0.012	68.5
20010	2.120	121.629	2.9882	0.04035	0.01702	0.002	120.184	0.810E-07	0.015	68.4
20011	2.120	121.415	3.0043	0.03423	0.01704	0.002	120.184	0.827E-07	0.017	67.0
20012	2.120	121.216	3.0196	0.02862	0.01705	0.003	120.182	0.855E-07	0.022	64.8
20061	2.154	122.043	3.0333	0.04708	0.01644	0.002	120.336	0.730E-07	0.016	71.9
20062	2.154	121.801	3.0520	0.04044	0.01644	0.002	120.335	0.724E-07	0.017	72.4
20063	2.154	121.577	3.0697	0.03430	0.01648	0.003	120.337	0.734E-07	0.021	71.4
20064	2.154	121.373	3.0862	0.02868	0.01652	0.003	120.336	0.755E-07	0.028	69.6
20057	2.331	121.961	3.4820	0.05056	0.01788	0.002	120.339	0.561E-07	0.017	88.9
20005	2.325	121.753	3.4889	0.05042	0.01872	0.002	120.182	0.584E-07	0.015	89.2
20058	2.331	121.735	3.5067	0.04365	0.01785	0.002	120.339	0.541E-07	0.017	91.8
20006	2.325	121.536	3.5130	0.04356	0.01875	0.002	120.185	0.583E-07	0.017	89.3
20059	2.331	121.530	3.5298	0.03727	0.01788	0.002	120.340	0.541E-07	0.020	91.7
20007	2.325	121.341	3.5353	0.03719	0.01880	0.002	120.186	0.596E-07	0.018	87.3
20060	2.331	121.346	3.5511	0.03140	0.01795	0.003	120.340	0.558E-07	0.026	89.0
20008	2.325	121.164	3.5560	0.03134	0.01880	0.003	120.185	0.607E-07	0.021	85.6
20053	2.463	121.791	3.8935	0.05051	0.01949	0.003	120.356	0.437E-07	0.024	112.0
20054	2.463	121.599	3.9228	0.04361	0.01943	0.003	120.356	0.426E-07	0.022	114.0
20055	2.463	121.417	3.9513	0.03724	0.01947	0.003	120.357	0.433E-07	0.022	111.9
20056	2.463	121.250	3.9784	0.03138	0.01955	0.004	120.356	0.436E-07	0.028	111.1
20001	2.507	121.483	4.0962	0.05035	0.02114	0.004	120.195	0.348E-07	0.030	145.5
20002	2.507	121.301	4.1293	0.04349	0.02107	0.004	120.196	0.331E-07	0.027	151.9
20003	2.507	121.138	4.1600	0.03714	0.02101	0.004	120.193	0.321E-07	0.027	155.2
20004	2.507	120.992	4.1884	0.03130	0.02090	0.004	120.194	0.313E-07	0.026	157.7

#### Nominal Temperature 122. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K)	Cell Temperature K	Thermal Diffusivity m**2/s	STAT	Specific Heat J/(mol.K)	
15064	2.664	121.837	17.6277	0.22056	0.05902	0.001	120.075	0.215E-07	0.006	152.3
15053	2.662	121.557	17.8766	0.18530	0.05958	0.001	120.075	0.230E-07	0.006	142.7
15062	2.661	121.300	18.0826	0.15320	0.06009	0.001	120.075	0.240E-07	0.008	137.1
15061	2.659	121.067	18.2546	0.12414	0.06050	0.001	120.072	0.252E-07	0.011	130.9

15060	2.984	121.839	18.2643	0.22055	0.06037 0.001	120.072	0.253E-07 0.005	130.1
15059	2.983	121.555	18.4480	0.18530	0.06097 0.001	120.072	0.265E-07 0.006	124.3
15056	3.471	122.462	18.5809	0.30059	0.06134 0.001	120.064	0.269E-07 0.004	122.8
15058	2.981	121.293	18.6063	0.15322	0.06148 0.001	120.070	0.271E-07 0.008	122.0
15057	2.980	121.061	18.7404	0.12418	0.06193 0.001	120.067	0.284E-07 0.010	116.2
15055	3.470	122.128	18.7603	0.25895	0.06200 0.001	120.063	0.283E-07 0.004	116.9
15054	3.469	121.818	18.9189	0.22055	0.06262 0.001	120.065	0.296E-07 0.005	112.3
15052	4.022	122.783	19.0315	0.34536	0.06292 0.001	120.057	0.294E-07 0.005	113.4
15053	3.468	121.530	19.0605	0.18521	0.06310 0.001	120.064	0.303E-07 0.006	109.6
15051	4.019	122.420	19.1905	0.30052	0.06358 0.001	120.057	0.304E-07 0.005	109.7
15050	4.017	122.087	19.3326	0.25892	0.06417 0.001	120.057	0.315E-07 0.005	106.3
15049	4.014	121.781	19.4586	0.22040	0.06468 0.001	120.059	0.327E-07 0.006	102.2
15048	4.743	122.701	19.6687	0.34525	0.06562 0.001	120.046	0.327E-07 0.005	103.2
15047	4.740	122.348	19.7955	0.30041	0.06625 0.001	120.046	0.340E-07 0.005	99.5
15046	4.737	122.020	19.9111	0.25882	0.06678 0.001	120.047	0.346E-07 0.005	97.9
15045	4.734	121.722	20.0138	0.22046	0.06729 0.001	120.044	0.356E-07 0.006	95.3
15044	5.752	122.712	20.3035	0.35446	0.06882 0.001	120.035	0.394E-07 0.005	87.3
15043	5.749	122.363	20.4085	0.30903	0.06936 0.001	120.035	0.408E-07 0.004	84.5
15042	5.744	122.043	20.5027	0.26682	0.06986 0.000	120.034	0.424E-07 0.004	81.3
15041	5.740	121.743	20.5902	0.22766	0.07023 0.000	120.033	0.428E-07 0.004	80.6
15040	8.155	122.691	21.3894	0.37318	0.07505 0.001	120.041	0.470E-07 0.004	75.9
15039	8.153	122.354	21.4689	0.32653	0.07553 0.001	120.041	0.482E-07 0.004	74.1
15038	8.151	122.042	21.5416	0.28307	0.07596 0.000	120.040	0.492E-07 0.003	72.6
15037	8.148	121.753	21.6084	0.24264	0.07630 0.000	120.039	0.503E-07 0.003	71.1
15036	10.817	122.603	22.2635	0.38254	0.08085 0.000	120.043	0.525E-07 0.004	70.2
15035	10.819	122.281	22.3285	0.33528	0.08130 0.000	120.043	0.533E-07 0.003	69.2
15034	10.819	121.985	22.3875	0.29185	0.08173 0.000	120.043	0.543E-07 0.003	68.1
15033	10.819	121.703	22.4435	0.25044	0.08198 0.000	120.043	0.537E-07 0.003	68.8
15032	14.136	122.590	23.0849	0.40139	0.08699 0.000	120.046	0.597E-07 0.003	64.0
15031	14.136	122.283	23.1381	0.35305	0.08736 0.000	120.045	0.612E-07 0.003	62.5
15030	14.136	121.992	23.1884	0.30791	0.08773 0.000	120.044	0.620E-07 0.003	61.7
15029	14.136	121.726	23.2345	0.26593	0.08803 0.000	120.041	0.638E-07 0.003	60.0
15028	18.384	122.561	23.9154	0.42154	0.09370 0.000	120.054	0.636E-07 0.003	62.4
15027	18.381	122.259	23.9609	0.37195	0.09402 0.000	120.054	0.635E-07 0.003	62.5
15026	18.379	121.980	24.0029	0.32561	0.09445 0.000	120.053	0.647E-07 0.003	61.4
15025	18.375	121.717	24.0421	0.28227	0.09453 0.000	120.052	0.634E-07 0.003	62.5
15024	23.319	122.536	24.6911	0.44182	0.10057 0.000	120.059	0.686E-07 0.003	60.0
15023	23.315	122.302	24.7223	0.40099	0.10086 0.000	120.058	0.692E-07 0.002	59.5
15022	23.312	122.033	24.7585	0.35290	0.10112 0.000	120.058	0.698E-07 0.003	59.1
15021	23.305	121.773	24.7927	0.30768	0.10141 0.000	120.056	0.698E-07 0.003	59.0
15020	29.333	122.440	25.4739	0.45203	0.10812 0.000	120.061	0.739E-07 0.003	58.0
15019	29.329	122.219	25.5005	0.41067	0.10837 0.000	120.061	0.739E-07 0.003	58.1
15018	29.326	121.957	25.5321	0.36180	0.10866 0.000	120.061	0.742E-07 0.003	57.8
15017	29.320	121.717	25.5608	0.31620	0.10897 0.000	120.058	0.749E-07 0.003	57.3
15016	36.600	122.420	26.2461	0.47320	0.11654 0.000	120.061	0.853E-07 0.002	52.5
15015	36.590	122.212	26.2682	0.43148	0.11651 0.000	120.061	0.849E-07 0.003	52.7
15014	36.589	121.962	26.2958	0.38134	0.11677 0.000	120.060	0.852E-07 0.003	52.5
15013	36.575	121.730	26.3202	0.33399	0.11685 0.000	120.057	0.868E-07 0.003	51.5
15012	45.777	122.358	27.0602	0.49457	0.12545 0.000	120.060	0.879E-07 0.003	53.1
15011	45.784	122.152	27.0813	0.45115	0.12570 0.000	120.059	0.878E-07 0.002	53.2
15010	45.777	121.916	27.1045	0.39999	0.12588 0.000	120.060	0.889E-07 0.003	52.6
15009	45.772	121.692	27.1267	0.35273	0.12609 0.000	120.057	0.882E-07 0.003	53.0
15008	55.887	122.214	27.8204	0.49464	0.13458 0.000	120.050	0.948E-07 0.003	51.4
15007	55.890	122.021	27.8383	0.45073	0.13477 0.000	120.050	0.955E-07 0.003	51.0
15006	55.882	121.796	27.8586	0.39964	0.13506 0.000	120.048	0.965E-07 0.003	50.5
15005	55.872	121.584	27.8774	0.35167	0.13529 0.000	120.047	0.970E-07 0.003	50.3
15001	67.480	122.243	28.5476	0.53913	0.14386 0.000	120.015	0.101E-06 0.002	50.2
15002	67.477	122.047	28.5642	0.49335	0.14415 0.000	120.015	0.102E-06 0.002	50.0
15003	67.480	121.825	28.5833	0.43982	0.14440 0.000	120.017	0.101E-06 0.003	50.2
15004	67.470	121.618	28.6004	0.38940	0.14457 0.000	120.016	0.104E-06 0.003	49.0

#### Nominal Temperature 131. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
13204	0.643	132.804	0.6166	0.04829	0.01305 0.002	130.016	0.755E-06 0.018	26.9
13203	0.643	132.403	0.6188	0.04121	0.01301 0.002	130.016	0.745E-06 0.017	27.2
13202	0.643	132.033	0.6209	0.03470	0.01299 0.002	130.014	0.753E-06 0.017	27.0
13201	0.643	131.688	0.6228	0.02875	0.01293 0.002	130.012	0.749E-06 0.019	27.0
13200	1.100	132.506	1.1084	0.04823	0.01358 0.001	130.016	0.385E-06 0.010	30.7

13199	1.100	132.147	1.1126	0.04116	0.01357	0.001	130.017	0.390E-06	0.009	30.3
13198	1.100	131.811	1.1165	0.03466	0.01354	0.001	130.015	0.389E-06	0.012	30.4
13197	1.100	131.506	1.1200	0.02872	0.01352	0.002	130.012	0.394E-06	0.016	29.9
13196	1.464	132.298	1.5405	0.04818	0.01415	0.001	130.013	0.261E-06	0.009	34.0
13195	1.464	131.964	1.5466	0.04113	0.01415	0.001	130.016	0.262E-06	0.009	33.9
13194	1.464	131.661	1.5521	0.03464	0.01413	0.001	130.011	0.264E-06	0.013	33.7
13193	1.464	131.383	1.5573	0.02871	0.01410	0.002	130.010	0.267E-06	0.020	33.2
13192	1.646	132.191	1.7726	0.04828	0.01448	0.001	130.010	0.213E-06	0.008	37.2
13191	1.646	131.876	1.7797	0.04111	0.01447	0.001	130.010	0.220E-06	0.013	35.9
13190	1.646	131.588	1.7863	0.03463	0.01446	0.001	130.009	0.223E-06	0.012	35.4
13189	1.646	131.322	1.7924	0.02871	0.01446	0.001	130.009	0.229E-06	0.014	34.6
13188	2.198	131.898	2.5694	0.04810	0.01587	0.001	130.013	0.139E-06	0.008	43.0
13187	2.198	131.619	2.5811	0.04106	0.01588	0.001	130.016	0.140E-06	0.009	43.0
13186	2.198	131.370	2.5917	0.03459	0.01587	0.001	130.014	0.140E-06	0.012	42.9
13185	2.198	131.140	2.6016	0.02868	0.01581	0.002	130.011	0.139E-06	0.016	42.8
13184	2.501	131.729	3.0834	0.04806	0.01690	0.001	130.022	0.107E-06	0.009	49.8
13183	2.501	131.481	3.0982	0.04104	0.01682	0.001	130.019	0.104E-06	0.010	51.0
13182	2.501	131.254	3.1120	0.03458	0.01692	0.001	130.021	0.112E-06	0.010	47.7
13181	2.501	131.044	3.1249	0.02867	0.01688	0.002	130.017	0.111E-06	0.014	48.0
13180	2.758	131.571	3.5851	0.04803	0.01806	0.001	130.023	0.858E-07	0.008	57.4
13179	2.758	131.347	3.6035	0.04101	0.01803	0.001	130.023	0.854E-07	0.009	57.5
13178	2.758	131.142	3.6207	0.03456	0.01807	0.001	130.023	0.884E-07	0.012	55.6
13177	2.758	130.962	3.6361	0.02867	0.01807	0.002	130.021	0.932E-07	0.015	52.7
13176	2.972	131.440	4.0660	0.04800	0.01927	0.001	130.028	0.713E-07	0.010	65.3
13175	2.972	131.234	4.0887	0.04099	0.01929	0.001	130.027	0.712E-07	0.009	65.3
13174	2.972	131.044	4.1103	0.03454	0.01933	0.001	130.026	0.735E-07	0.011	63.1
13173	2.972	130.877	4.1295	0.02865	0.01935	0.002	130.026	0.765E-07	0.014	60.6
13172	3.147	131.307	4.5233	0.04797	0.02054	0.001	130.026	0.573E-07	0.011	78.1
13171	3.147	131.121	4.5503	0.04097	0.02059	0.001	130.024	0.585E-07	0.012	76.5
13170	3.147	130.957	4.5749	0.03453	0.02062	0.001	130.023	0.599E-07	0.012	74.5
13169	3.147	130.795	4.5995	0.02864	0.02064	0.002	130.022	0.606E-07	0.016	73.5
13168	3.325	131.161	5.0674	0.04793	0.02232	0.002	130.021	0.452E-07	0.014	96.5
13167	3.325	130.990	5.1017	0.04095	0.02234	0.001	130.021	0.444E-07	0.011	97.9
13166	3.325	130.838	5.1332	0.03451	0.02236	0.002	130.019	0.448E-07	0.014	96.7
13165	3.325	130.697	5.1631	0.02862	0.02244	0.002	130.015	0.467E-07	0.017	92.7
13164	3.452	131.045	5.5339	0.04792	0.02401	0.002	130.020	0.368E-07	0.014	117.2
13163	3.452	130.886	5.5760	0.04093	0.02404	0.002	130.020	0.364E-07	0.014	118.1
13162	3.452	130.755	5.6114	0.03450	0.02407	0.002	130.018	0.375E-07	0.013	114.0
13161	3.452	130.626	5.6477	0.02863	0.02415	0.002	130.015	0.345E-07	0.018	123.9
13160	3.576	130.944	6.0725	0.04788	0.02604	0.002	130.015	0.324E-07	0.015	132.2
13159	3.576	130.811	6.1204	0.04090	0.02614	0.002	130.014	0.334E-07	0.015	128.0
13158	3.576	130.689	6.1655	0.03448	0.02622	0.002	130.013	0.348E-07	0.015	122.3
13157	3.576	130.575	6.2094	0.02860	0.02630	0.002	130.011	0.371E-07	0.019	114.4
13156	3.670	130.824	6.5856	0.04786	0.02826	0.003	130.004	0.259E-07	0.021	166.7
13155	3.670	130.696	6.6469	0.04088	0.02828	0.002	130.003	0.253E-07	0.017	168.6
13154	3.670	130.584	6.7029	0.03446	0.02844	0.002	130.000	0.271E-07	0.017	156.9
13153	3.670	130.474	6.7604	0.02860	0.02845	0.003	130.000	0.272E-07	0.021	155.3
13152	3.750	130.718	7.1181	0.04782	0.03067	0.003	129.994	0.200E-07	0.024	216.7
13151	3.750	130.619	7.1814	0.04086	0.03077	0.003	129.995	0.206E-07	0.019	209.8
13150	3.750	130.507	7.2563	0.03444	0.03100	0.003	129.995	0.215E-07	0.019	199.8
13149	3.750	130.431	7.3097	0.02856	0.03057	0.003	129.991	0.196E-07	0.021	214.8
13148	3.823	130.617	7.7199	0.04781	0.03371	0.004	129.990	0.152E-07	0.028	289.2
13147	3.823	130.531	7.7912	0.04085	0.03381	0.003	129.990	0.154E-07	0.021	282.5
13146	3.822	130.446	7.8662	0.03445	0.03376	0.003	129.989	0.156E-07	0.019	277.1
13145	3.822	130.350	7.9578	0.02858	0.03405	0.003	129.987	0.161E-07	0.021	266.3
13144	3.883	130.538	8.3290	0.04780	0.03694	0.004	129.992	0.128E-07	0.028	345.5
13143	3.883	130.462	8.4125	0.04084	0.03709	0.003	129.990	0.126E-07	0.021	348.7
13142	3.883	130.365	8.5308	0.03444	0.03732	0.003	129.990	0.130E-07	0.019	336.2
13141	3.883	130.323	8.5843	0.02857	0.03763	0.004	129.988	0.139E-07	0.023	315.7
13140	3.932	130.481	8.9040	0.04779	0.03996	0.004	129.996	0.111E-07	0.029	400.9
13139	3.932	130.420	8.9914	0.04083	0.03993	0.003	129.996	0.110E-07	0.022	401.8
13138	3.931	130.336	9.1136	0.03444	0.03977	0.003	129.997	0.107E-07	0.021	404.9
13137	3.931	130.253	9.2438	0.02857	0.04066	0.004	129.993	0.125E-07	0.026	349.9
13136	3.970	130.450	9.3970	0.04777	0.04260	0.004	129.998	0.102E-07	0.027	439.0
13135	3.970	130.377	9.5188	0.04082	0.04258	0.004	129.998	0.101E-07	0.022	436.2
13134	3.970	130.295	9.6612	0.03443	0.04297	0.003	129.998	0.112E-07	0.021	391.9
13133	3.970	130.219	9.7999	0.02857	0.04332	0.004	129.995	0.116E-07	0.025	376.3
13132	4.009	130.430	9.9119	0.04777	0.04522	0.004	130.003	0.102E-07	0.025	437.7
13131	4.008	130.352	10.0489	0.04082	0.04514	0.004	130.003	0.106E-07	0.022	415.6
13130	4.008	130.283	10.1823	0.03443	0.04564	0.003	130.003	0.113E-07	0.022	389.9
13129	4.008	130.248	10.2507	0.02857	0.04571	0.005	129.999	0.119E-07	0.030	369.9
13128	4.046	130.407	10.4196	0.04777	0.04707	0.003	130.007	0.111E-07	0.022	397.6

13127	4.046	130.346	10.5407	0.04083	0.04713	0.003	130.005	0.113E-07	0.021	388.2
13126	4.046	130.307	10.6197	0.03443	0.04738	0.004	130.005	0.135E-07	0.026	324.5
13124	4.076	130.428	10.7674	0.04777	0.04822	0.003	130.009	0.122E-07	0.023	355.8
13125	4.046	130.186	10.8736	0.02857	0.04774	0.005	130.002	0.139E-07	0.030	312.3
13123	4.076	130.361	10.9026	0.04082	0.04808	0.003	130.009	0.124E-07	0.019	347.1
13122	4.076	130.323	10.9819	0.03443	0.04837	0.003	130.008	0.139E-07	0.023	310.9
13120	4.105	130.408	11.1616	0.04777	0.04883	0.003	130.012	0.133E-07	0.019	319.4
13119	4.105	130.367	11.2457	0.04083	0.04846	0.003	130.013	0.132E-07	0.020	317.3
13121	4.076	130.194	11.2519	0.02857	0.04856	0.005	130.006	0.163E-07	0.032	261.0
13118	4.105	130.329	11.3260	0.03443	0.04881	0.004	130.011	0.157E-07	0.025	268.2
13117	4.105	130.198	11.6038	0.02858	0.04881	0.005	130.010	0.868E-08	0.028	477.1
13115	4.158	130.456	11.6859	0.05146	0.04914	0.003	130.023	0.103E-07	0.017	396.7
13114	4.158	130.374	11.8528	0.04424	0.04901	0.003	130.022	0.107E-07	0.016	374.9
13112	4.194	130.568	11.8638	0.06755	0.04964	0.004	130.007	0.116E-07	0.023	345.1
13111	4.194	130.514	11.9697	0.05922	0.04952	0.003	130.006	0.117E-07	0.018	342.1
13113	4.158	130.285	12.0362	0.03444	0.04933	0.004	130.023	0.119E-07	0.024	336.4
13110	4.194	130.445	12.1068	0.05146	0.04940	0.002	130.006	0.118E-07	0.015	335.3
13116	4.157	130.213	12.1821	0.02858	0.04901	0.005	130.024	0.117E-07	0.029	339.0
13109	4.194	130.360	12.2752	0.04424	0.04922	0.003	130.004	0.116E-07	0.018	336.8
13108	4.249	130.624	12.3174	0.07192	0.04961	0.003	130.010	0.129E-07	0.021	299.5
13107	4.249	130.548	12.4598	0.06332	0.04949	0.003	130.009	0.127E-07	0.017	302.3
13106	4.249	130.489	12.5712	0.05527	0.04940	0.002	130.008	0.131E-07	0.015	290.2
13105	4.249	130.416	12.7075	0.04777	0.04933	0.002	130.007	0.138E-07	0.016	273.9
13104	4.300	130.632	12.7765	0.07191	0.04947	0.003	130.008	0.133E-07	0.017	279.1
13103	4.300	130.563	12.8983	0.06332	0.04938	0.002	130.008	0.141E-07	0.014	262.9
13102	4.300	130.488	13.0309	0.05527	0.04941	0.002	130.007	0.142E-07	0.012	259.0
13100	4.346	130.643	13.1348	0.07192	0.04945	0.002	130.005	0.146E-07	0.016	249.5
13101	4.300	130.412	13.1640	0.04777	0.04920	0.002	130.005	0.149E-07	0.013	245.1
13099	4.346	130.560	13.2720	0.06333	0.04956	0.002	130.003	0.150E-07	0.013	241.9
13098	4.346	130.481	13.4026	0.05528	0.04942	0.002	130.002	0.151E-07	0.013	238.4
13097	4.346	130.408	13.5205	0.04778	0.04948	0.002	129.999	0.151E-07	0.015	236.3
13096	4.439	130.682	13.7340	0.07644	0.04960	0.002	130.008	0.154E-07	0.011	227.6
13095	4.439	130.600	13.8533	0.06757	0.04962	0.002	130.006	0.156E-07	0.011	223.8
13094	4.439	130.538	13.9422	0.05924	0.04966	0.002	130.004	0.162E-07	0.011	214.2
13093	4.439	130.477	14.0234	0.05147	0.04974	0.002	130.003	0.169E-07	0.014	204.9
13092	4.511	130.740	14.0772	0.08109	0.04986	0.002	130.007	0.172E-07	0.011	199.8
13091	4.511	130.654	14.1907	0.07194	0.04988	0.002	130.007	0.175E-07	0.011	196.0
13090	4.511	130.572	14.2965	0.06334	0.04992	0.002	130.006	0.171E-07	0.011	200.1
13088	4.550	130.722	14.3076	0.08116	0.04998	0.002	129.998	0.167E-07	0.011	203.8
13084	4.723	131.347	14.3929	0.14786	0.05054	0.003	129.999	0.192E-07	0.025	175.8
13089	4.510	130.491	14.3951	0.05535	0.04992	0.002	130.001	0.179E-07	0.012	190.4
13087	4.549	130.648	14.3954	0.07200	0.05000	0.001	129.997	0.168E-07	0.008	201.6
13086	4.549	130.566	14.4954	0.06340	0.05015	0.001	129.996	0.173E-07	0.010	196.1
13083	4.723	131.235	14.5134	0.13534	0.05047	0.003	129.998	0.190E-07	0.020	177.0
13085	4.549	130.489	14.5868	0.05535	0.05020	0.002	129.994	0.176E-07	0.012	191.7
13082	4.722	131.125	14.6291	0.12339	0.05055	0.002	129.998	0.193E-07	0.016	173.5
13081	4.722	131.023	14.7375	0.11200	0.05058	0.002	129.996	0.193E-07	0.013	173.1
13080	4.931	131.605	14.9420	0.17455	0.05116	0.003	130.002	0.214E-07	0.024	154.9
13079	4.931	131.478	15.0571	0.16091	0.05124	0.003	130.003	0.212E-07	0.020	156.1
13078	4.930	131.354	15.1660	0.14782	0.05121	0.002	130.002	0.210E-07	0.016	156.8
13077	4.930	131.181	15.3160	0.12927	0.05138	0.002	129.998	0.211E-07	0.011	155.8
13076	5.149	131.823	15.4209	0.19610	0.05193	0.003	130.000	0.250E-07	0.021	130.8
13075	5.149	131.623	15.5754	0.17456	0.05201	0.002	130.001	0.252E-07	0.017	129.6
13074	5.148	131.493	15.6718	0.16092	0.05214	0.002	130.000	0.255E-07	0.013	127.9
13073	5.147	131.315	15.8004	0.14152	0.05221	0.001	129.997	0.257E-07	0.010	126.1
13071	5.497	131.951	16.1376	0.21111	0.05313	0.002	130.010	0.275E-07	0.015	117.6
13070	5.498	131.741	16.2689	0.18871	0.05330	0.001	130.009	0.276E-07	0.011	116.8
13069	5.498	131.612	16.3477	0.17449	0.05340	0.001	130.002	0.281E-07	0.009	114.7
13068	5.764	132.314	16.4121	0.25146	0.05347	0.001	130.004	0.274E-07	0.009	116.7
13072	5.497	131.424	16.4592	0.15425	0.05360	0.001	130.010	0.286E-07	0.007	112.4
13067	5.763	132.084	16.5395	0.22688	0.05377	0.001	130.003	0.280E-07	0.006	114.4
13066	5.762	131.943	16.6151	0.21124	0.05392	0.001	130.002	0.283E-07	0.006	113.1
13065	5.760	131.736	16.7242	0.18885	0.05422	0.001	130.001	0.292E-07	0.004	109.9
13063	6.607	132.497	17.4654	0.27722	0.05647	0.001	130.015	0.324E-07	0.005	99.0
13062	6.605	132.263	17.5595	0.25139	0.05678	0.001	130.015	0.335E-07	0.004	96.0
13061	6.602	132.042	17.6471	0.22686	0.05709	0.000	130.013	0.345E-07	0.004	93.5
13064	6.609	131.900	17.7119	0.21115	0.05723	0.000	130.017	0.348E-07	0.004	92.6
13060	7.936	132.959	18.4724	0.34244	0.06012	0.000	130.022	0.373E-07	0.004	87.5
13059	7.934	132.623	18.5772	0.30419	0.06056	0.000	130.022	0.384E-07	0.004	85.1
13058	7.932	132.389	18.6492	0.27705	0.06089	0.000	130.022	0.395E-07	0.004	82.9
13057	7.929	132.164	18.7177	0.25124	0.06117	0.001	130.018	0.405E-07	0.004	80.9
13056	9.443	132.805	19.4389	0.34216	0.06430	0.001	130.010	0.419E-07	0.004	79.5

13055	9.442	132.491	19.5195	0.30396	0.06473	0.000	130.010	0.435E-07	0.004	76.8
13054	9.441	132.265	19.5767	0.27688	0.06502	0.000	130.009	0.444E-07	0.004	75.3
13053	9.439	132.054	19.6302	0.25111	0.06527	0.001	130.006	0.448E-07	0.004	74.6
13052	11.153	132.734	20.2366	0.35182	0.06858	0.001	130.000	0.462E-07	0.005	74.2
13051	11.153	132.659	20.2534	0.34209	0.06872	0.001	130.002	0.469E-07	0.004	73.1
13050	11.153	132.360	20.3198	0.30386	0.06913	0.001	130.002	0.483E-07	0.004	71.1
13049	11.153	131.944	20.4116	0.25100	0.06967	0.000	130.000	0.501E-07	0.004	68.7
13244	13.317	132.681	21.0196	0.36120	0.07363	0.001	130.021	0.520E-07	0.004	68.1
13243	13.315	132.318	21.0893	0.31254	0.07402	0.000	130.021	0.530E-07	0.004	66.9
13242	13.311	131.981	21.1532	0.26753	0.07439	0.000	130.018	0.536E-07	0.004	66.3
13241	13.305	131.677	21.2101	0.22603	0.07463	0.001	130.017	0.544E-07	0.004	65.2
13240	15.941	132.777	21.7514	0.39192	0.07838	0.000	130.032	0.570E-07	0.003	64.0
13239	15.938	132.419	21.8120	0.34115	0.07872	0.000	130.032	0.580E-07	0.003	63.0
13238	15.934	132.084	21.8685	0.29400	0.07906	0.000	130.034	0.584E-07	0.003	62.5
13237	15.929	131.779	21.9196	0.25047	0.07937	0.000	130.027	0.598E-07	0.003	61.1
13236	19.783	132.761	22.6300	0.41268	0.08463	0.000	130.030	0.650E-07	0.003	58.3
13235	19.779	132.412	22.6819	0.36057	0.08501	0.000	130.030	0.664E-07	0.003	57.1
13234	19.774	132.091	22.7294	0.31207	0.08533	0.000	130.029	0.675E-07	0.003	56.2
13233	19.766	131.799	22.7721	0.26714	0.08555	0.000	130.026	0.700E-07	0.003	54.1
13232	24.309	132.593	23.4790	0.41232	0.09132	0.000	130.032	0.713E-07	0.003	55.1
13231	24.307	132.267	23.5226	0.36031	0.09167	0.000	130.032	0.722E-07	0.003	54.5
13230	24.302	131.965	23.5626	0.31191	0.09193	0.000	130.030	0.734E-07	0.003	53.6
13229	24.296	131.689	23.5988	0.26700	0.09212	0.000	130.030	0.751E-07	0.003	52.3
13228	29.024	132.644	24.1814	0.44498	0.09735	0.000	130.034	0.746E-07	0.003	54.5
13227	29.020	132.325	24.2202	0.39081	0.09772	0.000	130.034	0.764E-07	0.003	53.3
13226	29.019	132.028	24.2566	0.34027	0.09798	0.000	130.034	0.777E-07	0.003	52.4
13225	29.006	131.753	24.2888	0.29327	0.09814	0.000	130.031	0.788E-07	0.003	51.6
13024	35.210	132.509	24.9748	0.46159	0.10749	0.000	130.031	0.803E-07	0.003	54.1
13023	35.204	132.273	25.0005	0.41743	0.10759	0.000	130.031	0.812E-07	0.003	53.5
13224	35.659	132.530	25.0238	0.45573	0.10523	0.000	130.035	0.797E-07	0.003	53.2
13022	35.204	131.986	25.0327	0.36543	0.10824	0.000	130.031	0.824E-07	0.003	52.9
13223	35.654	132.229	25.0567	0.40096	0.10548	0.000	130.036	0.807E-07	0.003	52.6
13021	35.201	131.731	25.0611	0.31701	0.10832	0.000	130.028	0.839E-07	0.003	51.9
13222	35.649	131.947	25.0876	0.34980	0.10574	0.000	130.036	0.815E-07	0.003	52.1
13221	35.643	131.686	25.1160	0.30224	0.10601	0.000	130.034	0.818E-07	0.003	51.9
13220	43.253	132.492	25.8145	0.47827	0.11312	0.000	130.028	0.872E-07	0.003	50.7
13020	43.365	132.508	25.8234	0.49553	0.11758	0.000	130.045	0.859E-07	0.002	53.5
13219	43.247	132.201	25.8436	0.42212	0.11351	0.000	130.027	0.887E-07	0.003	49.9
13019	43.368	132.223	25.8527	0.43862	0.11813	0.000	130.044	0.864E-07	0.003	53.3
13218	43.242	131.930	25.8706	0.36961	0.11382	0.000	130.026	0.903E-07	0.003	49.0
13018	43.367	131.953	25.8800	0.38545	0.11852	0.000	130.044	0.889E-07	0.003	51.9
13217	43.234	131.676	25.8957	0.32057	0.11404	0.000	130.024	0.916E-07	0.003	48.4
13017	43.363	131.721	25.9033	0.33570	0.11813	0.000	130.042	0.905E-07	0.003	50.7
13016	51.797	132.483	26.5616	0.51897	0.12613	0.000	130.064	0.916E-07	0.002	52.3
13216	51.995	132.447	26.5809	0.50127	0.12166	0.000	130.028	0.917E-07	0.003	50.3
13015	51.790	132.199	26.5877	0.46076	0.12727	0.000	130.062	0.929E-07	0.002	51.9
13215	51.992	132.164	26.6071	0.44370	0.12192	0.000	130.026	0.917E-07	0.003	50.3
13014	51.787	131.960	26.6098	0.40602	0.12672	0.000	130.063	0.941E-07	0.003	50.9
13214	51.979	131.906	26.6303	0.38988	0.12201	0.000	130.028	0.912E-07	0.003	50.5
13013	51.782	131.705	26.6333	0.35493	0.12821	0.000	130.064	0.953E-07	0.003	50.8
13213	51.972	131.659	26.6529	0.33943	0.12207	0.000	130.026	0.919E-07	0.003	50.1
13008	61.458	132.376	27.2918	0.53061	0.13424	0.000	130.032	0.982E-07	0.003	50.4
13012	61.473	132.374	27.2930	0.53067	0.13452	0.000	130.031	0.984E-07	0.002	50.4
13212	61.558	132.292	27.3060	0.50078	0.13020	0.000	130.030	0.929E-07	0.003	51.7
13007	61.453	132.115	27.3141	0.47166	0.13521	0.000	130.031	0.997E-07	0.003	49.9
13011	61.470	132.099	27.3167	0.47180	0.13552	0.000	130.031	0.990E-07	0.003	50.4
13211	61.556	132.030	27.3286	0.44344	0.13046	0.000	130.030	0.934E-07	0.003	51.4
13006	61.433	131.878	27.3334	0.41627	0.13456	0.000	130.029	0.103E-06	0.003	48.2
13010	61.466	131.851	27.3380	0.41645	0.13582	0.000	130.031	0.991E-07	0.002	50.4
13210	61.549	131.813	27.3470	0.38955	0.13070	0.000	130.030	0.106E-06	0.003	45.3
13005	61.426	131.652	27.3527	0.36450	0.13495	0.000	130.029	0.105E-06	0.003	47.3
13009	61.464	131.635	27.3567	0.36462	0.13608	0.000	130.031	0.102E-06	0.003	49.2
13209	61.541	131.587	27.3662	0.33920	0.13084	0.000	130.026	0.108E-06	0.003	44.3
13208	68.743	132.369	27.7719	0.53661	0.13606	0.000	130.022	0.102E-06	0.003	48.2
13207	68.748	132.111	27.7937	0.47710	0.13626	0.000	130.023	0.104E-06	0.003	47.4
13206	68.755	131.862	27.8148	0.42115	0.13652	0.000	130.022	0.103E-06	0.003	47.7
13004	69.669	132.320	27.8337	0.55432	0.14039	0.000	129.991	0.942E-07	0.002	53.9
13205	68.769	131.637	27.8344	0.36956	0.13675	0.000	130.023	0.106E-06	0.003	46.7
13003	69.669	132.062	27.8550	0.49415	0.14089	0.000	129.991	0.945E-07	0.002	53.8
13002	69.671	131.824	27.8748	0.43756	0.14118	0.000	129.990	0.950E-07	0.003	53.6
13001	69.670	131.588	27.8942	0.38449	0.14156	0.000	129.990	0.931E-07	0.003	54.8

## Nominal Temperature 152. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
14188	0.713	153.263	0.5820	0.06176	0.01465 0.003	150.088	0.789E-06 0.035	30.6
14187	0.713	152.606	0.5848	0.04892	0.01486 0.002	150.087	0.913E-06 0.018	26.9
14186	0.713	152.028	0.5874	0.03762	0.01483 0.002	150.088	0.939E-06 0.018	26.2
14185	0.713	151.524	0.5896	0.02781	0.01480 0.002	150.087	0.974E-06 0.022	25.3
14184	1.126	153.694	0.9393	0.07608	0.01528 0.001	150.087	0.536E-06 0.011	29.0
14183	1.126	153.016	0.9444	0.06172	0.01521 0.001	150.086	0.524E-06 0.010	29.6
14182	1.126	152.413	0.9490	0.04890	0.01519 0.001	150.086	0.538E-06 0.011	28.9
14181	1.126	151.880	0.9531	0.03760	0.01518 0.002	150.085	0.568E-06 0.023	27.4
14180	1.753	153.339	1.5249	0.07625	0.01596 0.001	150.088	0.312E-06 0.006	32.2
14179	1.753	152.732	1.5333	0.06190	0.01597 0.001	150.088	0.319E-06 0.008	31.6
14178	1.753	152.188	1.5410	0.04908	0.01572 0.002	150.088	0.291E-06 0.016	34.1
14177	1.753	151.703	1.5478	0.03776	0.01585 0.001	150.085	0.320E-06 0.012	31.3
14176	2.240	153.500	2.0088	0.08661	0.01666 0.001	150.088	0.229E-06 0.006	34.7
14175	2.240	152.897	2.0210	0.07124	0.01659 0.000	150.088	0.224E-06 0.004	35.4
14174	2.240	152.345	2.0323	0.05719	0.01658 0.001	150.088	0.228E-06 0.007	34.8
14173	2.240	151.857	2.0424	0.04491	0.01657 0.001	150.086	0.232E-06 0.008	34.3
14172	2.679	153.219	2.4859	0.08623	0.01738 0.001	150.083	0.167E-06 0.005	40.2
14171	2.679	152.661	2.5013	0.07092	0.01737 0.001	150.083	0.168E-06 0.005	40.1
14170	2.679	152.161	2.5153	0.05715	0.01734 0.001	150.084	0.166E-06 0.006	40.6
14169	2.679	151.717	2.5280	0.04489	0.01734 0.001	150.083	0.166E-06 0.009	40.5
14168	3.137	153.008	3.0199	0.08616	0.01824 0.001	150.102	0.136E-06 0.005	42.8
14167	3.137	152.486	3.0395	0.07088	0.01821 0.001	150.102	0.134E-06 0.005	43.4
14166	3.137	152.024	3.0571	0.05712	0.01824 0.001	150.102	0.137E-06 0.007	42.5
14165	3.137	151.611	3.0732	0.04485	0.01816 0.001	150.099	0.135E-06 0.009	43.0
14164	3.517	152.807	3.4987	0.08611	0.01910 0.001	150.102	0.113E-06 0.006	46.7
14163	3.517	152.329	3.5216	0.07084	0.01909 0.001	150.102	0.114E-06 0.006	46.4
14162	3.517	151.892	3.5430	0.05710	0.01909 0.001	150.102	0.114E-06 0.007	46.2
14161	3.517	151.506	3.5622	0.04484	0.01906 0.001	150.099	0.113E-06 0.010	46.6
14160	3.805	152.655	3.8856	0.08607	0.01982 0.001	150.100	0.988E-07 0.006	50.2
14159	3.805	152.203	3.9117	0.07081	0.01982 0.001	150.098	0.989E-07 0.006	50.1
14158	3.805	151.785	3.9362	0.05708	0.01983 0.001	150.099	0.977E-07 0.007	50.6
14157	3.805	151.420	3.9581	0.04483	0.01983 0.001	150.096	0.983E-07 0.009	50.2
14156	4.191	152.465	4.4393	0.08603	0.02094 0.001	150.103	0.836E-07 0.006	55.1
14155	4.191	152.043	4.4703	0.07078	0.02092 0.001	150.103	0.827E-07 0.006	55.5
14154	4.191	151.663	4.4987	0.05706	0.02098 0.001	150.100	0.839E-07 0.007	54.7
14153	4.191	151.329	4.5243	0.04481	0.02096 0.001	150.101	0.848E-07 0.010	54.0
14152	4.436	152.343	4.8151	0.08598	0.02173 0.001	150.101	0.752E-07 0.007	58.7
14151	4.436	151.941	4.8495	0.07076	0.02173 0.001	150.101	0.747E-07 0.006	58.9
14150	4.436	151.580	4.8810	0.05704	0.02176 0.001	150.098	0.750E-07 0.007	58.6
14149	4.436	151.163	4.9183	0.04107	0.02181 0.001	150.097	0.769E-07 0.010	57.1
14148	4.794	151.920	5.4290	0.07563	0.02302 0.001	150.104	0.637E-07 0.005	65.5
14147	4.794	151.578	5.4661	0.06142	0.02307 0.001	150.104	0.642E-07 0.007	65.0
14146	4.794	151.269	5.5002	0.04871	0.02308 0.001	150.103	0.654E-07 0.009	63.6
14145	4.794	150.995	5.5311	0.03748	0.02314 0.002	150.101	0.682E-07 0.013	60.9
14144	5.103	151.795	5.9752	0.07560	0.02428 0.001	150.104	0.569E-07 0.006	70.5
14143	5.103	151.473	6.0172	0.06139	0.02432 0.001	150.104	0.563E-07 0.007	71.0
14142	5.103	151.188	6.0552	0.04869	0.02438 0.001	150.104	0.578E-07 0.009	69.1
14141	5.103	150.927	6.0908	0.03748	0.02444 0.002	150.100	0.590E-07 0.013	67.5
14140	5.345	151.732	6.4251	0.07558	0.02535 0.001	150.104	0.589E-07 0.006	66.1
14139	5.345	151.428	6.4707	0.06139	0.02538 0.001	150.103	0.598E-07 0.008	65.0
14138	5.345	151.155	6.5127	0.04869	0.02549 0.001	150.103	0.646E-07 0.010	60.1
14137	5.345	150.916	6.5500	0.03747	0.02548 0.002	150.102	0.692E-07 0.016	55.9
14136	5.599	151.623	6.9261	0.07555	0.02658 0.001	150.099	0.526E-07 0.007	72.2
14135	5.599	151.338	6.9754	0.06137	0.02658 0.001	150.099	0.533E-07 0.007	70.9
14134	5.599	151.076	7.0219	0.04868	0.02674 0.001	150.098	0.572E-07 0.012	66.2
14133	5.599	150.848	7.0630	0.03746	0.02673 0.002	150.096	0.600E-07 0.015	62.8
14132	5.793	151.530	7.3251	0.07553	0.02753 0.001	150.088	0.463E-07 0.007	80.4
14131	5.793	151.264	7.3762	0.06136	0.02760 0.001	150.088	0.483E-07 0.008	76.8
14130	5.793	151.019	7.4243	0.04867	0.02773 0.001	150.088	0.513E-07 0.010	72.4
14129	5.793	150.803	7.4677	0.03746	0.02785 0.002	150.089	0.540E-07 0.014	68.7
14128	6.056	151.457	7.8765	0.07553	0.02888 0.001	150.091	0.445E-07 0.008	81.5
14127	6.056	151.199	7.9329	0.06136	0.02898 0.001	150.090	0.458E-07 0.008	79.2
14126	6.056	150.962	7.9856	0.04867	0.02913 0.001	150.090	0.474E-07 0.011	76.5
14125	6.056	150.761	8.0312	0.03745	0.02914 0.002	150.087	0.506E-07 0.016	71.3
14124	6.297	151.380	8.3977	0.07551	0.03023 0.001	150.089	0.411E-07 0.007	86.9
14123	6.297	151.130	8.4583	0.06133	0.03031 0.001	150.090	0.419E-07 0.008	85.0

14122	6.297	150.921	8.5100	0.04866	0.03046	0.001	150.088	0.448E-07	0.011	79.5
14121	6.297	150.722	8.5599	0.03745	0.03053	0.002	150.087	0.489E-07	0.016	72.6
14120	6.510	151.484	8.8198	0.08576	0.03141	0.001	150.089	0.384E-07	0.008	91.8
14119	6.510	151.233	8.8846	0.07061	0.03143	0.001	150.091	0.388E-07	0.007	90.4
14118	6.510	151.012	8.9430	0.05694	0.03160	0.001	150.089	0.404E-07	0.009	87.1
14117	6.510	150.812	8.9965	0.04474	0.03163	0.002	150.088	0.429E-07	0.013	81.6
14116	6.751	151.428	9.3413	0.08573	0.03272	0.001	150.092	0.373E-07	0.008	93.2
14115	6.751	151.186	9.4086	0.07058	0.03276	0.001	150.090	0.371E-07	0.007	93.3
14114	6.751	150.964	9.4714	0.05693	0.03286	0.001	150.090	0.382E-07	0.009	90.4
14113	6.751	150.776	9.5254	0.04474	0.03294	0.002	150.088	0.400E-07	0.013	86.1
14112	6.980	151.378	9.8315	0.08571	0.03391	0.001	150.093	0.365E-07	0.008	93.8
14111	6.980	151.144	9.9003	0.07057	0.03405	0.001	150.094	0.377E-07	0.007	90.8
14110	6.980	150.939	9.9613	0.05691	0.03420	0.001	150.093	0.389E-07	0.009	88.0
14109	6.980	150.762	10.0147	0.04472	0.03427	0.002	150.091	0.401E-07	0.013	85.0
14108	7.185	151.487	10.2158	0.09660	0.03504	0.001	150.091	0.362E-07	0.008	94.1
14107	7.185	151.248	10.2881	0.08048	0.03508	0.001	150.090	0.355E-07	0.007	95.5
14106	7.185	151.034	10.3538	0.06584	0.03517	0.001	150.089	0.365E-07	0.008	92.7
14105	7.185	150.836	10.4150	0.05266	0.03529	0.001	150.088	0.384E-07	0.010	87.9
14104	7.423	151.430	10.7041	0.09658	0.03622	0.001	150.089	0.348E-07	0.006	96.7
14103	7.423	151.206	10.7739	0.08047	0.03627	0.001	150.089	0.351E-07	0.008	95.6
14102	7.423	150.995	10.8405	0.06584	0.03645	0.001	150.088	0.364E-07	0.007	92.2
14101	7.423	150.816	10.8980	0.05267	0.03656	0.001	150.086	0.380E-07	0.010	88.1
14100	7.690	151.462	11.1999	0.10227	0.03750	0.001	150.088	0.346E-07	0.007	96.4
14099	7.690	151.165	11.2946	0.08046	0.03756	0.001	150.088	0.354E-07	0.007	93.6
14098	7.690	150.961	11.3606	0.06583	0.03773	0.001	150.088	0.358E-07	0.009	92.4
14097	7.689	150.791	11.4145	0.05266	0.03790	0.001	150.088	0.374E-07	0.011	88.6
14096	7.916	151.648	11.5503	0.12036	0.03849	0.001	150.079	0.335E-07	0.009	99.0
14095	7.916	151.410	11.6259	0.10226	0.03859	0.001	150.079	0.342E-07	0.006	96.8
14094	7.916	151.127	11.7170	0.08045	0.03862	0.001	150.079	0.347E-07	0.007	94.6
14093	7.916	150.930	11.7814	0.06580	0.03881	0.001	150.076	0.351E-07	0.008	93.7
14092	8.261	151.598	12.1531	0.12035	0.03991	0.001	150.079	0.343E-07	0.006	95.4
14091	8.261	151.364	12.2278	0.10226	0.04007	0.001	150.081	0.345E-07	0.005	94.9
14090	8.261	151.089	12.3166	0.08045	0.04015	0.001	150.080	0.354E-07	0.007	91.9
14089	8.261	150.906	12.3761	0.06577	0.04033	0.001	150.079	0.371E-07	0.009	87.7
14088	8.534	151.743	12.5425	0.13319	0.04089	0.001	150.098	0.344E-07	0.005	94.7
14087	8.534	151.502	12.6186	0.11411	0.04100	0.001	150.098	0.349E-07	0.009	92.9
14086	8.534	151.217	12.7091	0.09100	0.04122	0.001	150.096	0.365E-07	0.006	88.8
14085	8.534	151.020	12.7725	0.07537	0.04138	0.001	150.096	0.376E-07	0.008	86.1
14084	8.919	151.779	13.0972	0.13988	0.04235	0.001	150.105	0.358E-07	0.005	90.4
14083	8.919	151.546	13.1697	0.12031	0.04250	0.001	150.106	0.368E-07	0.006	87.6
14082	8.919	151.260	13.2587	0.09653	0.04269	0.001	150.104	0.383E-07	0.006	84.1
14081	8.919	151.001	13.3402	0.07536	0.04287	0.001	150.103	0.404E-07	0.008	79.7
14080	9.249	152.073	13.4543	0.16831	0.04336	0.001	150.105	0.356E-07	0.006	90.7
14079	9.249	151.661	13.5787	0.13318	0.04359	0.001	150.106	0.371E-07	0.005	86.7
14078	9.249	151.295	13.6902	0.10222	0.04389	0.001	150.103	0.387E-07	0.006	82.9
14077	9.249	150.981	13.7865	0.07536	0.04410	0.001	150.103	0.399E-07	0.009	80.4
14075	9.657	152.021	13.9782	0.16827	0.04478	0.001	150.103	0.371E-07	0.005	86.5
14074	9.657	151.614	14.0975	0.13317	0.04495	0.001	150.102	0.370E-07	0.005	86.3
14073	9.657	151.259	14.2020	0.10218	0.04530	0.001	150.101	0.396E-07	0.006	80.8
14076	9.657	150.946	14.2950	0.07537	0.04551	0.001	150.103	0.407E-07	0.008	78.3
14072	10.191	152.402	14.4664	0.20754	0.04617	0.001	150.103	0.373E-07	0.006	85.8
14071	10.191	151.961	14.5894	0.16824	0.04648	0.001	150.103	0.385E-07	0.004	83.1
14070	10.191	151.570	14.6988	0.13315	0.04668	0.001	150.102	0.390E-07	0.005	81.6
14069	10.190	151.224	14.7956	0.10217	0.04704	0.001	150.101	0.415E-07	0.006	76.7
14068	10.710	152.329	15.0040	0.20748	0.04779	0.001	150.098	0.387E-07	0.004	82.6
14067	10.710	151.901	15.1180	0.16820	0.04806	0.000	150.097	0.400E-07	0.004	79.8
14064	11.062	152.741	15.2182	0.25092	0.04858	0.001	150.083	0.387E-07	0.006	82.9
14066	10.710	151.519	15.2201	0.13312	0.04832	0.001	150.096	0.408E-07	0.005	78.0
14065	10.710	151.186	15.3094	0.10217	0.04859	0.001	150.094	0.421E-07	0.006	75.6
14063	11.061	152.273	15.3382	0.20744	0.04882	0.000	150.085	0.393E-07	0.004	81.3
14062	11.061	151.852	15.4468	0.16818	0.04913	0.001	150.082	0.402E-07	0.004	79.3
14061	11.061	151.481	15.5428	0.13307	0.04943	0.001	150.082	0.417E-07	0.004	76.6
14060	11.989	153.125	15.8789	0.29857	0.05078	0.001	150.081	0.403E-07	0.006	79.9
14059	11.989	152.631	15.9964	0.25083	0.05106	0.000	150.080	0.409E-07	0.003	78.4
14058	11.989	152.177	16.1046	0.20738	0.05136	0.000	150.080	0.414E-07	0.004	77.4
14057	11.989	151.774	16.2007	0.16809	0.05163	0.001	150.078	0.421E-07	0.004	76.0
14056	12.875	153.328	16.4499	0.32910	0.05278	0.001	150.079	0.417E-07	0.006	77.4
14055	12.875	152.822	16.5624	0.27884	0.05307	0.000	150.079	0.425E-07	0.003	75.8
14054	12.875	152.361	16.6646	0.23287	0.05340	0.000	150.080	0.435E-07	0.003	74.0
14053	12.875	151.945	16.7571	0.19114	0.05371	0.000	150.076	0.445E-07	0.003	72.3
14052	13.522	153.260	16.8646	0.32900	0.05428	0.000	150.102	0.418E-07	0.004	77.6
14051	13.522	152.762	16.9701	0.27879	0.05463	0.000	150.103	0.420E-07	0.003	77.1

14050	13.522	152.317	17.0644	0.23283	0.05494 0.000	150.102	0.430E-07 0.003	75.2
14049	13.521	151.907	17.1509	0.19109	0.05523 0.000	150.103	0.429E-07 0.003	75.4
14048	15.012	153.102	17.6880	0.32888	0.05766 0.000	150.064	0.483E-07 0.003	68.0
14047	15.011	152.629	17.7788	0.27871	0.05799 0.000	150.063	0.493E-07 0.004	66.6
14046	15.010	152.209	17.8594	0.23282	0.05832 0.000	150.062	0.515E-07 0.003	63.7
14045	15.008	151.819	17.9335	0.19108	0.05857 0.000	150.060	0.528E-07 0.004	62.2
14044	16.502	153.167	18.3360	0.35003	0.06052 0.000	150.059	0.509E-07 0.004	65.3
14043	16.502	152.699	18.4191	0.29819	0.06087 0.000	150.062	0.520E-07 0.004	64.0
14042	16.502	152.277	18.4942	0.25058	0.06121 0.001	150.059	0.541E-07 0.004	61.6
14041	16.502	151.892	18.5626	0.20721	0.06154 0.000	150.058	0.567E-07 0.004	58.8
14040	18.620	153.196	19.1153	0.37158	0.06430 0.000	150.072	0.533E-07 0.004	63.6
14039	18.619	152.738	19.1890	0.31815	0.06467 0.000	150.072	0.545E-07 0.004	62.2
14038	18.618	152.320	19.2561	0.26890	0.06498 0.000	150.069	0.553E-07 0.004	61.4
14037	18.618	151.941	19.3174	0.22383	0.06529 0.000	150.068	0.569E-07 0.004	59.7
14036	21.565	152.998	20.0331	0.37131	0.06931 0.000	150.069	0.575E-07 0.004	60.7
14035	21.564	152.573	20.0945	0.31794	0.06965 0.000	150.069	0.589E-07 0.004	59.3
14034	21.559	152.179	20.1507	0.26875	0.06996 0.000	150.068	0.599E-07 0.004	58.4
14033	21.557	151.823	20.2018	0.22372	0.07019 0.000	150.066	0.610E-07 0.003	57.3
14032	25.085	153.090	20.8812	0.40515	0.07446 0.000	150.069	0.641E-07 0.004	56.2
14031	25.084	152.669	20.9364	0.34922	0.07479 0.000	150.069	0.660E-07 0.003	54.6
14030	25.083	152.284	20.9871	0.29761	0.07515 0.000	150.067	0.681E-07 0.003	53.0
14029	25.082	151.931	21.0334	0.25010	0.07535 0.000	150.067	0.699E-07 0.004	51.5
14028	28.455	152.937	21.5896	0.40496	0.07912 0.000	150.073	0.682E-07 0.004	54.2
14027	28.455	152.537	21.6384	0.34907	0.07952 0.000	150.073	0.701E-07 0.003	52.9
14026	28.455	152.169	21.6834	0.29750	0.07980 0.000	150.072	0.715E-07 0.003	51.8
14025	28.453	151.833	21.7242	0.24999	0.08005 0.000	150.073	0.735E-07 0.003	50.4
14024	33.228	152.915	22.4142	0.42816	0.08511 0.000	150.079	0.722E-07 0.003	53.1
14023	33.228	152.534	22.4569	0.37069	0.08552 0.000	150.079	0.749E-07 0.003	51.3
14022	33.226	152.174	22.4971	0.31750	0.08577 0.000	150.079	0.751E-07 0.003	51.1
14021	33.221	151.853	22.5323	0.26832	0.08600 0.000	150.077	0.775E-07 0.004	49.5
14020	39.067	152.799	23.2645	0.43986	0.09200 0.000	150.079	0.765E-07 0.003	52.1
14019	39.064	152.432	23.3019	0.38157	0.09230 0.000	150.079	0.774E-07 0.003	51.5
14018	39.061	152.094	23.3363	0.32760	0.09262 0.000	150.079	0.789E-07 0.003	50.6
14017	39.057	151.787	23.3674	0.27770	0.09276 0.000	150.078	0.799E-07 0.003	50.0
14016	45.225	152.851	24.0055	0.47653	0.09851 0.000	150.079	0.802E-07 0.003	51.6
14015	45.224	152.489	24.0400	0.41581	0.09882 0.000	150.081	0.804E-07 0.003	51.5
14014	45.219	152.156	24.0713	0.35929	0.09904 0.000	150.078	0.808E-07 0.003	51.2
14013	45.217	151.848	24.1005	0.30683	0.09921 0.000	150.079	0.818E-07 0.003	50.6
14012	52.327	152.747	24.7523	0.48883	0.10551 0.000	150.088	0.817E-07 0.003	52.6
14011	52.327	152.406	24.7826	0.42731	0.10585 0.000	150.083	0.831E-07 0.003	51.7
14010	52.327	152.087	24.8111	0.37001	0.10608 0.000	150.087	0.827E-07 0.003	52.0
14009	52.325	151.794	24.8370	0.31699	0.10636 0.000	150.083	0.828E-07 0.003	52.0
14008	60.885	152.612	25.5256	0.48854	0.11346 0.000	150.088	0.961E-07 0.003	46.6
14007	60.882	152.292	25.5520	0.42710	0.11367 0.000	150.087	0.974E-07 0.003	45.9
14006	60.877	151.996	25.5760	0.36985	0.11394 0.000	150.086	0.100E-06 0.003	44.8
14005	60.873	151.716	25.5990	0.31679	0.11411 0.000	150.083	0.101E-06 0.004	44.5
14004	69.301	152.653	26.1731	0.52710	0.12053 0.000	150.076	0.100E-06 0.003	46.2
14003	69.305	152.341	26.1979	0.46321	0.12069 0.000	150.076	0.101E-06 0.003	45.9
14002	69.307	152.044	26.2212	0.40351	0.12067 0.000	150.076	0.101E-06 0.003	45.9
14001	69.312	151.769	26.2431	0.34784	0.12120 0.000	150.075	0.104E-06 0.003	44.6

#### Nominal Temperature 174. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)
12200	0.696	175.475	0.4891	0.07323	0.01640 0.002	171.992	0.131E-05 0.019	24.6
12199	0.696	175.009	0.4905	0.06263	0.01619 0.002	171.992	0.133E-05 0.018	24.1
12198	0.696	174.554	0.4919	0.05316	0.01599 0.002	171.992	0.125E-05 0.020	25.3
12197	0.696	174.086	0.4934	0.04402	0.01585 0.003	171.989	0.117E-05 0.030	26.9
12196	1.305	175.396	0.9374	0.07977	0.01690 0.001	171.989	0.614E-06 0.010	28.3
12195	1.306	174.958	0.9407	0.06935	0.01680 0.001	171.987	0.617E-06 0.010	28.0
12194	1.306	174.517	0.9435	0.05888	0.01661 0.001	171.987	0.607E-06 0.012	28.2
12193	1.306	174.084	0.9462	0.04966	0.01675 0.001	171.986	0.598E-06 0.014	28.9
12192	2.086	175.278	1.5429	0.08517	0.01762 0.001	171.993	0.360E-06 0.008	30.6
12191	2.086	174.851	1.5477	0.07363	0.01746 0.001	171.993	0.361E-06 0.007	30.2
12190	2.086	174.406	1.5528	0.06357	0.01762 0.001	171.993	0.338E-06 0.009	32.7
12189	2.086	174.034	1.5571	0.05434	0.01767 0.001	171.991	0.340E-06 0.011	32.6
12188	2.695	175.261	2.0405	0.09049	0.01820 0.001	171.992	0.268E-06 0.007	32.1
12187	2.695	174.834	2.0475	0.07891	0.01815 0.001	171.991	0.264E-06 0.006	32.5
12186	2.695	174.443	2.0539	0.06807	0.01808 0.001	171.990	0.265E-06 0.007	32.3

12185	2.695	174.059	2.0603	0.05890	0.01837	0.001	171.988	0.259E-06	0.008	33.6
12184	3.313	175.207	2.5694	0.09634	0.01905	0.001	171.989	0.207E-06	0.006	34.6
12183	3.313	174.797	2.5785	0.08452	0.01905	0.001	171.989	0.203E-06	0.006	35.3
12182	3.313	174.443	2.5864	0.07321	0.01883	0.001	171.987	0.206E-06	0.007	34.4
12181	3.313	174.068	2.5949	0.06311	0.01902	0.001	171.986	0.203E-06	0.007	35.3
12180	3.890	175.023	3.0895	0.09599	0.01963	0.001	171.988	0.170E-06	0.006	36.1
12179	3.890	174.645	3.1003	0.08471	0.01971	0.001	171.989	0.167E-06	0.006	36.9
12178	3.890	174.272	3.1111	0.07379	0.01983	0.001	171.987	0.167E-06	0.007	37.3
12177	3.890	173.941	3.1208	0.06356	0.01985	0.001	171.985	0.165E-06	0.007	37.8
12176	4.283	175.075	3.4522	0.10323	0.02043	0.001	171.984	0.151E-06	0.006	37.9
12175	4.283	174.699	3.4649	0.09100	0.02039	0.001	171.983	0.147E-06	0.006	38.9
12174	4.283	174.340	3.4771	0.07997	0.02057	0.001	171.982	0.149E-06	0.006	38.8
12173	4.283	174.014	3.4882	0.06960	0.02062	0.001	171.979	0.145E-06	0.005	39.8
12172	4.768	174.897	3.9222	0.10378	0.02134	0.001	171.984	0.131E-06	0.006	40.3
12171	4.768	174.546	3.9365	0.09197	0.02140	0.001	171.983	0.129E-06	0.005	41.0
12170	4.768	174.221	3.9499	0.08053	0.02138	0.001	171.984	0.130E-06	0.006	40.8
12169	4.768	173.914	3.9626	0.07010	0.02147	0.001	171.980	0.128E-06	0.006	41.4
12168	5.416	174.690	4.5774	0.10423	0.02257	0.001	171.986	0.111E-06	0.007	43.0
12167	5.416	174.374	4.5936	0.09211	0.02252	0.001	171.985	0.112E-06	0.007	42.8
12166	5.416	174.066	4.6096	0.08088	0.02257	0.001	171.985	0.111E-06	0.006	43.2
12165	5.416	173.783	4.6245	0.07043	0.02272	0.001	171.985	0.114E-06	0.007	42.4
12164	5.940	174.538	5.1290	0.10452	0.02362	0.001	171.991	0.100E-06	0.008	44.9
12163	5.940	174.227	5.1480	0.09247	0.02372	0.001	171.992	0.101E-06	0.006	44.8
12162	5.940	173.945	5.1656	0.08114	0.02365	0.001	171.992	0.993E-07	0.006	45.2
12161	5.940	173.684	5.1819	0.07068	0.02371	0.001	171.991	0.100E-06	0.006	44.8
12160	6.414	174.555	5.6331	0.11121	0.02465	0.001	171.993	0.896E-07	0.009	47.6
12159	6.414	174.255	5.6544	0.09872	0.02468	0.001	171.992	0.898E-07	0.006	47.5
12158	6.414	173.976	5.6744	0.08694	0.02466	0.001	171.992	0.881E-07	0.007	48.4
12157	6.414	173.716	5.6931	0.07598	0.02469	0.001	171.989	0.889E-07	0.006	48.0
12156	6.840	174.403	6.1082	0.11096	0.02561	0.001	171.992	0.805E-07	0.009	50.9
12155	6.840	174.127	6.1304	0.09842	0.02553	0.001	171.989	0.797E-07	0.007	51.2
12154	6.840	173.892	6.1495	0.08658	0.02558	0.001	171.991	0.895E-07	0.006	45.6
12153	6.840	173.647	6.1694	0.07557	0.02562	0.001	171.989	0.932E-07	0.006	43.8
12152	7.252	174.329	6.5713	0.11103	0.02644	0.001	171.987	0.811E-07	0.008	48.5
12151	7.252	174.058	6.5956	0.09858	0.02649	0.001	171.989	0.821E-07	0.006	48.0
12150	7.252	173.804	6.6185	0.08675	0.02643	0.001	171.988	0.820E-07	0.006	47.9
12149	7.252	173.565	6.6404	0.07575	0.02651	0.001	171.986	0.831E-07	0.006	47.4
12148	7.653	174.180	7.0348	0.11126	0.02749	0.001	171.984	0.681E-07	0.008	56.2
12147	7.653	173.921	7.0605	0.09868	0.02743	0.001	171.984	0.667E-07	0.006	57.3
12146	7.653	173.682	7.0844	0.08686	0.02747	0.001	171.984	0.670E-07	0.006	57.0
12145	7.653	173.452	7.1072	0.07588	0.02755	0.001	171.981	0.671E-07	0.007	57.0
12144	8.269	174.049	7.7442	0.11129	0.02900	0.001	171.991	0.637E-07	0.008	57.8
12143	8.269	173.805	7.7719	0.09880	0.02901	0.001	171.990	0.628E-07	0.007	58.5
12142	8.269	173.572	7.7985	0.08700	0.02905	0.001	171.991	0.625E-07	0.007	58.8
12141	8.269	173.364	7.8226	0.07604	0.02909	0.001	171.988	0.621E-07	0.007	59.2
12140	8.599	173.969	8.1269	0.11117	0.02981	0.001	171.989	0.596E-07	0.008	60.6
12139	8.599	173.732	8.1556	0.09853	0.02977	0.001	171.989	0.592E-07	0.006	60.8
12138	8.599	173.509	8.1827	0.08666	0.02989	0.001	171.984	0.592E-07	0.006	61.0
12137	8.599	173.304	8.2078	0.07559	0.02995	0.001	171.984	0.603E-07	0.007	59.9
12136	9.171	173.866	8.7797	0.11120	0.03128	0.001	171.987	0.579E-07	0.007	60.7
12135	9.171	173.643	8.8092	0.09861	0.03131	0.001	171.988	0.578E-07	0.006	60.8
12134	9.171	173.437	8.8368	0.08678	0.03136	0.001	171.986	0.586E-07	0.006	59.9
12133	9.171	173.243	8.8629	0.07570	0.03128	0.001	171.984	0.582E-07	0.007	60.1
12132	9.535	173.897	9.1757	0.11769	0.03233	0.001	171.982	0.551E-07	0.007	63.2
12131	9.535	173.685	9.2051	0.10477	0.03223	0.001	171.983	0.552E-07	0.005	62.7
12130	9.535	173.472	9.2348	0.09258	0.03235	0.001	171.981	0.554E-07	0.006	62.7
12129	9.535	173.281	9.2617	0.08119	0.03235	0.001	171.982	0.557E-07	0.007	62.2
12128	10.041	173.950	9.7113	0.12455	0.03353	0.001	171.998	0.553E-07	0.007	61.7
12127	10.041	173.735	9.7430	0.11128	0.03355	0.001	171.996	0.554E-07	0.006	61.5
12126	10.041	173.530	9.7732	0.09869	0.03362	0.001	171.996	0.555E-07	0.006	61.4
12125	10.041	173.333	9.8022	0.08688	0.03365	0.001	171.996	0.561E-07	0.006	60.8
12124	10.510	173.985	10.1934	0.13157	0.03472	0.001	171.996	0.543E-07	0.007	62.1
12123	10.510	173.771	10.2257	0.11790	0.03474	0.001	171.997	0.544E-07	0.006	61.8
12122	10.510	173.566	10.2570	0.10498	0.03478	0.001	171.997	0.543E-07	0.005	62.0
12121	10.510	173.380	10.2855	0.09278	0.03484	0.001	171.996	0.557E-07	0.007	60.4
12120	11.053	174.024	10.7296	0.13872	0.03603	0.001	172.008	0.545E-07	0.006	61.1
12119	11.053	173.811	10.7628	0.12464	0.03604	0.001	172.005	0.542E-07	0.006	61.3
12118	11.053	173.614	10.7938	0.11135	0.03606	0.001	172.005	0.549E-07	0.006	60.5
12117	11.053	173.421	10.8243	0.09878	0.03613	0.001	172.005	0.551E-07	0.006	60.2
12116	11.608	174.155	11.2361	0.15361	0.03732	0.001	172.010	0.525E-07	0.008	62.8
12115	11.608	173.940	11.2704	0.13880	0.03737	0.001	172.010	0.527E-07	0.006	62.4
12114	11.608	173.636	11.3192	0.11792	0.03738	0.001	172.009	0.523E-07	0.007	62.7

12113	11.608	173.446	11.3498	0.10500	0.03749	0.001	172.007	0.528E-07	0.005	62.3
12112	11.830	174.119	11.4449	0.15384	0.03785	0.001	172.001	0.520E-07	0.008	63.2
12111	11.830	173.904	11.4794	0.13896	0.03790	0.001	172.000	0.520E-07	0.006	63.1
12110	11.830	173.700	11.5123	0.12477	0.03789	0.001	172.000	0.522E-07	0.006	62.7
12109	11.830	173.510	11.5432	0.11137	0.03798	0.001	171.998	0.525E-07	0.006	62.3
12108	12.130	174.071	11.7206	0.15376	0.03854	0.001	171.996	0.516E-07	0.006	63.3
12107	12.130	173.858	11.7550	0.13902	0.03867	0.001	171.996	0.516E-07	0.005	63.4
12106	12.130	173.662	11.7869	0.12494	0.03864	0.001	171.996	0.518E-07	0.005	63.0
12105	12.130	173.482	11.8163	0.11159	0.03869	0.001	171.991	0.527E-07	0.006	61.8
12104	12.642	174.124	12.1503	0.16147	0.03969	0.001	171.996	0.524E-07	0.006	61.9
12103	12.642	173.915	12.1841	0.14612	0.03970	0.001	171.996	0.523E-07	0.004	62.0
12102	12.642	173.713	12.2171	0.13160	0.03977	0.001	171.994	0.521E-07	0.005	62.3
12101	12.642	173.526	12.2478	0.11789	0.03982	0.001	171.996	0.524E-07	0.005	61.8
12100	12.932	174.284	12.3626	0.17740	0.04029	0.001	171.980	0.515E-07	0.006	62.9
12099	12.932	174.067	12.3979	0.16136	0.04033	0.001	171.980	0.516E-07	0.006	62.7
12098	12.932	173.864	12.4310	0.14607	0.04042	0.001	171.979	0.524E-07	0.005	61.8
12097	12.932	173.669	12.4630	0.13160	0.04045	0.001	171.979	0.529E-07	0.005	61.2
12096	13.788	174.412	13.0031	0.19417	0.04210	0.001	171.987	0.530E-07	0.007	60.9
12095	13.788	174.199	13.0375	0.17735	0.04214	0.001	171.988	0.536E-07	0.005	60.1
12094	13.788	173.991	13.0713	0.16133	0.04218	0.001	171.987	0.538E-07	0.005	59.8
12093	13.788	173.698	13.1191	0.13880	0.04235	0.001	171.984	0.552E-07	0.005	58.3
12092	14.484	174.438	13.4939	0.20294	0.04352	0.001	171.982	0.533E-07	0.006	60.4
12091	14.484	174.222	13.5285	0.18572	0.04356	0.001	171.982	0.536E-07	0.004	59.9
12090	14.484	174.015	13.5619	0.16945	0.04362	0.001	171.983	0.532E-07	0.005	60.4
12089	14.484	173.731	13.6078	0.14633	0.04375	0.001	171.984	0.542E-07	0.005	59.2
12088	15.583	175.348	14.0639	0.28968	0.04555	0.002	171.991	0.514E-07	0.013	62.9
12087	15.582	174.862	14.1389	0.24917	0.04558	0.001	171.990	0.507E-07	0.007	63.5
12086	15.582	174.525	14.1915	0.22065	0.04559	0.001	171.991	0.504E-07	0.005	63.7
12085	15.582	174.095	14.2587	0.18545	0.04576	0.000	171.989	0.501E-07	0.003	64.0
12084	16.242	175.261	14.4691	0.28944	0.04672	0.001	171.986	0.518E-07	0.010	62.3
12083	16.241	174.784	14.5420	0.24875	0.04678	0.001	171.986	0.520E-07	0.006	61.9
12082	16.241	174.448	14.5935	0.22029	0.04688	0.000	171.985	0.519E-07	0.004	62.0
12081	16.240	174.038	14.6565	0.18528	0.04705	0.000	171.984	0.516E-07	0.004	62.2
12080	17.145	175.276	14.9647	0.29962	0.04842	0.001	171.996	0.534E-07	0.009	60.6
12079	17.145	174.807	15.0349	0.25839	0.04852	0.001	171.998	0.534E-07	0.005	60.5
12078	17.145	174.480	15.0839	0.22953	0.04863	0.000	171.997	0.536E-07	0.003	60.2
12077	17.144	174.076	15.1446	0.19378	0.04884	0.000	171.995	0.541E-07	0.003	59.7
12076	18.421	175.273	15.6004	0.31014	0.05049	0.001	172.008	0.548E-07	0.007	59.2
12075	18.421	174.815	15.6666	0.26826	0.05063	0.000	172.011	0.553E-07	0.004	58.6
12074	18.420	174.495	15.7129	0.23886	0.05074	0.000	172.011	0.554E-07	0.003	58.4
12073	18.420	174.097	15.7706	0.20239	0.05089	0.000	172.008	0.555E-07	0.003	58.3
12072	19.228	175.426	15.9454	0.33222	0.05180	0.001	172.032	0.563E-07	0.006	57.9
12071	19.228	174.965	16.0107	0.28921	0.05194	0.000	172.003	0.563E-07	0.004	57.8
12070	19.228	174.638	16.0570	0.25861	0.05203	0.000	172.003	0.566E-07	0.004	57.4
12069	19.227	174.236	16.1139	0.22058	0.05221	0.000	171.999	0.572E-07	0.004	56.8
12068	20.323	175.330	16.4190	0.33259	0.05348	0.000	172.008	0.557E-07	0.003	58.7
12067	20.322	174.882	16.4804	0.28915	0.05366	0.000	172.009	0.563E-07	0.003	58.0
12066	20.322	174.580	16.5218	0.25933	0.05379	0.000	172.007	0.575E-07	0.003	56.8
12065	20.321	174.186	16.5757	0.22117	0.05396	0.000	172.008	0.579E-07	0.003	56.4
12064	21.793	175.327	16.9789	0.34478	0.05571	0.000	172.008	0.570E-07	0.003	57.8
12063	21.792	174.888	17.0366	0.30047	0.05593	0.000	172.007	0.581E-07	0.003	56.7
12062	21.790	174.578	17.0770	0.26925	0.05607	0.000	172.007	0.587E-07	0.003	56.1
12061	21.790	174.195	17.1278	0.23041	0.05628	0.000	172.005	0.601E-07	0.003	54.9
12060	23.519	175.191	17.5830	0.34427	0.05831	0.000	172.007	0.594E-07	0.003	56.1
12059	23.518	174.871	17.6232	0.31074	0.05847	0.000	172.006	0.602E-07	0.003	55.4
12058	23.517	174.564	17.6617	0.27900	0.05866	0.000	172.005	0.604E-07	0.003	55.2
12057	23.517	174.190	17.7091	0.23938	0.05877	0.000	172.004	0.612E-07	0.003	54.5
12056	24.701	175.303	17.9344	0.36747	0.05994	0.000	171.992	0.599E-07	0.003	56.1
12055	24.701	174.979	17.9740	0.33282	0.06009	0.000	171.995	0.600E-07	0.003	56.0
12054	24.701	174.571	18.0241	0.28912	0.06034	0.000	171.991	0.608E-07	0.003	55.3
12053	24.699	174.289	18.0584	0.25860	0.06043	0.000	171.989	0.612E-07	0.003	54.9
12052	26.418	175.181	18.4359	0.36715	0.06240	0.000	171.987	0.623E-07	0.003	54.6
12051	26.417	174.864	18.4732	0.33253	0.06256	0.000	171.986	0.622E-07	0.003	54.7
12050	26.415	174.473	18.5190	0.28914	0.06275	0.000	171.985	0.625E-07	0.003	54.5
12049	26.414	174.196	18.5516	0.25860	0.06290	0.000	171.985	0.632E-07	0.003	53.9
12048	28.649	175.253	18.9965	0.39112	0.06528	0.000	171.990	0.638E-07	0.003	54.2
12047	28.646	174.942	19.0309	0.35543	0.06545	0.000	171.992	0.642E-07	0.003	53.9
12046	28.644	174.556	19.0742	0.31051	0.06566	0.000	171.988	0.655E-07	0.003	52.8
12045	28.643	174.281	19.1050	0.27883	0.06576	0.000	171.991	0.650E-07	0.003	53.2
12044	30.786	175.120	19.5011	0.39120	0.06803	0.000	171.985	0.656E-07	0.003	53.5
12043	30.786	174.823	19.5333	0.35549	0.06819	0.000	171.983	0.658E-07	0.003	53.4
12042	30.784	174.451	19.5732	0.31048	0.06843	0.000	171.983	0.668E-07	0.003	52.6

12041	30.782	174.190	19.6011	0.27882	0.06835	0.000	171.981	0.661E-07	0.003	53.0
12040	33.454	175.200	20.0434	0.41590	0.07118	0.000	171.992	0.681E-07	0.003	52.5
12039	33.451	174.907	20.0732	0.37904	0.07133	0.000	171.993	0.688E-07	0.003	52.0
12038	33.451	174.534	20.1119	0.33260	0.07156	0.000	171.991	0.692E-07	0.003	51.7
12037	33.448	174.278	20.1381	0.29976	0.07152	0.000	171.990	0.694E-07	0.003	51.4
12036	36.207	175.182	20.5568	0.42848	0.07433	0.000	171.998	0.709E-07	0.003	51.4
12035	36.204	174.794	20.5949	0.37895	0.07447	0.000	171.998	0.709E-07	0.003	51.4
12034	36.207	174.529	20.6217	0.34384	0.07471	0.000	171.998	0.718E-07	0.003	50.8
12033	36.206	174.266	20.6479	0.31047	0.07440	0.001	171.996	0.686E-07	0.007	52.8
12032	38.940	175.157	21.0205	0.44141	0.07732	0.000	171.993	0.727E-07	0.003	51.0
12031	38.938	174.777	21.0565	0.39113	0.07759	0.000	171.993	0.730E-07	0.003	50.8
12030	38.940	174.520	21.0816	0.35541	0.07771	0.000	171.992	0.742E-07	0.003	50.0
12029	38.939	174.267	21.1056	0.32145	0.07783	0.000	171.991	0.740E-07	0.003	50.1
12028	41.783	175.029	21.4716	0.44125	0.08022	0.000	171.992	0.720E-07	0.004	52.2
12027	41.782	174.583	21.5128	0.37886	0.08063	0.000	171.991	0.739E-07	0.003	51.0
12026	41.780	174.408	21.5286	0.35525	0.08079	0.000	171.994	0.740E-07	0.003	51.0
12025	41.780	174.170	21.5506	0.32130	0.08091	0.000	171.992	0.748E-07	0.003	50.5
12024	45.912	174.994	22.0520	0.45522	0.08468	0.000	171.993	0.783E-07	0.003	49.4
12023	45.909	174.561	22.0898	0.39183	0.08493	0.000	171.994	0.793E-07	0.003	48.8
12022	45.907	174.400	22.1037	0.36784	0.08506	0.000	171.996	0.804E-07	0.003	48.1
12021	45.904	174.167	22.1240	0.33328	0.08498	0.001	171.994	0.795E-07	0.004	48.6
12020	49.493	174.981	22.5064	0.46837	0.08819	0.000	171.999	0.814E-07	0.002	48.5
12019	49.490	174.560	22.5418	0.40400	0.08844	0.000	171.999	0.831E-07	0.003	47.5
12018	49.490	174.318	22.5624	0.36772	0.08860	0.000	171.999	0.830E-07	0.003	47.6
12017	49.487	174.168	22.5749	0.34453	0.08868	0.000	171.998	0.833E-07	0.003	47.4
12016	54.262	174.830	23.0673	0.46828	0.09272	0.000	171.993	0.831E-07	0.003	48.7
12015	54.264	174.422	23.1006	0.40346	0.09299	0.000	171.996	0.836E-07	0.003	48.4
12014	54.264	174.194	23.1192	0.36726	0.09314	0.000	171.995	0.848E-07	0.003	47.8
12013	54.261	174.048	23.1308	0.34405	0.09318	0.000	171.993	0.842E-07	0.003	48.1
12012	58.800	174.715	23.5497	0.46727	0.09680	0.000	172.003	0.849E-07	0.003	48.7
12011	58.796	174.333	23.5793	0.40300	0.09706	0.000	172.003	0.865E-07	0.003	47.8
12010	58.789	174.115	23.5956	0.36680	0.09720	0.000	172.005	0.874E-07	0.003	47.4
12009	58.780	173.976	23.6057	0.34365	0.09722	0.000	172.004	0.874E-07	0.004	47.3
12008	63.986	174.844	24.0336	0.50806	0.10123	0.000	171.995	0.911E-07	0.003	46.5
12007	63.982	174.574	24.0537	0.46717	0.10132	0.000	171.997	0.914E-07	0.003	46.3
12006	63.982	174.240	24.0789	0.40303	0.10164	0.000	171.996	0.939E-07	0.003	45.2
12005	63.980	173.893	24.1049	0.34365	0.10187	0.000	171.997	0.949E-07	0.003	44.7
12003	67.003	174.831	24.3025	0.52202	0.10372	0.000	171.981	0.901E-07	0.003	47.7
12002	67.015	174.520	24.3265	0.46716	0.10389	0.000	171.984	0.907E-07	0.003	47.4
12004	67.003	174.156	24.3523	0.40288	0.10420	0.000	171.979	0.913E-07	0.003	47.1
12001	67.018	173.815	24.3789	0.34346	0.10424	0.000	171.984	0.907E-07	0.003	47.3

#### Nominal Temperature 203. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)	
11170	1.619	203.704	0.9872	0.09211	0.01990	0.001	200.118	0.733E-06	0.012
11169	1.619	203.203	0.9902	0.07927	0.01982	0.001	200.119	0.706E-06	0.010
11168	1.620	202.753	0.9929	0.06773	0.01978	0.001	200.120	0.681E-06	0.011
11167	1.620	202.345	0.9952	0.05711	0.01981	0.001	200.119	0.694E-06	0.012
11166	2.298	203.462	1.4221	0.09169	0.02030	0.001	200.119	0.477E-06	0.010
11165	2.299	203.011	1.4261	0.07926	0.02025	0.001	200.121	0.465E-06	0.008
11164	2.299	202.596	1.4296	0.06772	0.02023	0.001	200.121	0.469E-06	0.008
11163	2.299	202.211	1.4331	0.05711	0.02025	0.001	200.120	0.473E-06	0.009
11162	2.984	203.503	1.8706	0.09865	0.02088	0.001	200.115	0.361E-06	0.008
11161	2.984	203.050	1.8759	0.08542	0.02080	0.001	200.117	0.348E-06	0.007
11160	2.985	202.634	1.8810	0.07342	0.02075	0.001	200.116	0.335E-06	0.008
11159	2.985	202.260	1.8853	0.06235	0.02078	0.001	200.116	0.338E-06	0.008
11158	3.656	203.547	2.3197	0.10542	0.02146	0.001	200.114	0.286E-06	0.007
11157	3.656	203.115	2.3264	0.09203	0.02140	0.001	200.115	0.284E-06	0.006
11156	3.656	202.703	2.3326	0.07957	0.02141	0.001	200.116	0.278E-06	0.007
11155	3.657	202.333	2.3385	0.06804	0.02139	0.001	200.115	0.279E-06	0.008
11154	4.399	203.575	2.8280	0.11244	0.02219	0.001	200.117	0.235E-06	0.008
11153	4.399	203.153	2.8361	0.09857	0.02217	0.001	200.120	0.234E-06	0.006
11152	4.399	202.742	2.8441	0.08525	0.02215	0.001	200.118	0.229E-06	0.007
11151	4.399	202.550	2.8478	0.07916	0.02213	0.001	200.120	0.227E-06	0.007
11150	5.371	203.524	3.5111	0.11926	0.02323	0.001	200.110	0.187E-06	0.008
11149	5.371	203.112	3.5216	0.10500	0.02322	0.001	200.108	0.184E-06	0.007
11148	5.371	202.737	3.5313	0.09160	0.02318	0.001	200.109	0.185E-06	0.007
11147	5.372	202.375	3.5409	0.07917	0.02312	0.001	200.109	0.177E-06	0.006

11146	5.372	202.041	3.5496	0.06765	0.02311	0.001	200.109	0.174E-06	0.006	36.8
11145	6.262	202.915	4.1694	0.10499	0.02424	0.001	200.109	0.155E-06	0.007	36.7
11144	6.262	202.561	4.1807	0.09165	0.02420	0.001	200.110	0.154E-06	0.007	36.8
11143	6.262	202.232	4.1914	0.07923	0.02415	0.001	200.109	0.151E-06	0.006	37.5
11142	6.262	201.913	4.2018	0.06772	0.02415	0.001	200.112	0.146E-06	0.006	38.8
11141	6.818	203.171	4.5668	0.11915	0.02500	0.001	200.109	0.144E-06	0.008	37.1
11140	6.818	202.812	4.5801	0.10494	0.02493	0.001	200.113	0.142E-06	0.007	37.4
11139	6.819	202.466	4.5929	0.09156	0.02487	0.001	200.112	0.139E-06	0.007	38.2
11138	6.819	202.148	4.6046	0.07913	0.02486	0.001	200.112	0.136E-06	0.007	39.0
11137	7.543	203.028	5.1057	0.11913	0.02591	0.001	200.115	0.127E-06	0.009	39.0
11136	7.543	202.680	5.1208	0.10489	0.02590	0.001	200.115	0.127E-06	0.007	38.9
11135	7.543	202.360	5.1343	0.09153	0.02582	0.001	200.115	0.125E-06	0.007	39.4
11134	7.543	202.052	5.1475	0.07913	0.02582	0.001	200.116	0.123E-06	0.006	40.3
11133	8.032	203.282	5.4563	0.13428	0.02662	0.001	200.105	0.123E-06	0.012	38.8
11132	8.032	202.921	5.4727	0.11911	0.02658	0.001	200.107	0.120E-06	0.008	39.5
11131	8.032	202.581	5.4884	0.10486	0.02657	0.001	200.108	0.119E-06	0.008	40.0
11130	8.032	202.262	5.5032	0.09153	0.02650	0.001	200.111	0.113E-06	0.007	41.7
11129	8.852	203.111	6.0718	0.13419	0.02779	0.001	200.112	0.111E-06	0.011	40.2
11128	8.852	202.769	6.0897	0.11907	0.02777	0.001	200.112	0.110E-06	0.009	40.7
11127	8.852	202.451	6.1066	0.10484	0.02774	0.001	200.112	0.108E-06	0.008	41.4
11126	8.852	202.160	6.1221	0.09158	0.02767	0.001	200.110	0.107E-06	0.007	41.7
11125	9.493	203.322	6.5335	0.15039	0.02883	0.002	200.107	0.105E-06	0.015	41.0
11124	9.493	202.985	6.5529	0.13435	0.02880	0.001	200.109	0.105E-06	0.011	41.1
11123	9.493	202.660	6.5717	0.11920	0.02872	0.001	200.108	0.101E-06	0.010	42.2
11122	9.493	202.348	6.5899	0.10491	0.02869	0.001	200.106	0.100E-06	0.008	42.7
11121	10.207	203.185	7.0649	0.15032	0.02984	0.002	200.105	0.982E-07	0.015	42.0
11120	10.207	202.854	7.0858	0.13426	0.02979	0.001	200.104	0.972E-07	0.010	42.4
11119	10.207	202.541	7.1058	0.11912	0.02976	0.001	200.105	0.953E-07	0.009	43.1
11118	10.207	202.252	7.1243	0.10491	0.02972	0.001	200.105	0.952E-07	0.008	43.1
11117	10.944	203.069	7.6072	0.15034	0.03101	0.002	200.114	0.933E-07	0.014	42.8
11116	10.945	202.747	7.6297	0.13431	0.03094	0.001	200.115	0.908E-07	0.011	43.8
11115	10.945	202.453	7.6502	0.11916	0.03090	0.001	200.115	0.903E-07	0.009	44.0
11114	10.945	202.166	7.6705	0.10495	0.03084	0.001	200.115	0.871E-07	0.008	45.5
11113	11.584	203.112	8.0606	0.15871	0.03201	0.002	200.120	0.889E-07	0.015	43.8
11112	11.584	202.800	8.0835	0.14221	0.03192	0.001	200.122	0.868E-07	0.012	44.7
11111	11.584	202.501	8.1057	0.12658	0.03186	0.001	200.122	0.842E-07	0.009	46.0
11110	11.584	202.237	8.1254	0.11225	0.03183	0.001	200.121	0.845E-07	0.008	45.7
11109	12.259	202.992	8.5416	0.15898	0.03303	0.002	200.111	0.850E-07	0.014	44.6
11108	12.259	202.689	8.5657	0.14218	0.03290	0.001	200.112	0.833E-07	0.009	45.3
11107	12.259	202.404	8.5882	0.12659	0.03291	0.001	200.113	0.822E-07	0.008	45.9
11106	12.259	202.139	8.6092	0.11240	0.03288	0.001	200.112	0.805E-07	0.008	46.8
11105	13.123	202.870	9.1402	0.15920	0.03435	0.001	200.109	0.831E-07	0.012	44.5
11104	13.123	202.569	9.1656	0.14218	0.03425	0.001	200.108	0.797E-07	0.009	46.2
11103	13.124	202.293	9.1890	0.12660	0.03426	0.001	200.110	0.783E-07	0.009	47.0
11102	13.124	202.037	9.2106	0.11192	0.03420	0.001	200.108	0.769E-07	0.008	47.8
11101	13.977	203.184	9.6741	0.18517	0.03569	0.002	200.100	0.799E-07	0.016	45.4
11100	13.978	202.881	9.7008	0.16727	0.03564	0.001	200.101	0.789E-07	0.012	45.8
11099	13.978	202.455	9.7381	0.14219	0.03558	0.001	200.102	0.752E-07	0.009	48.0
11098	13.978	202.201	9.7606	0.12660	0.03559	0.001	200.099	0.748E-07	0.009	48.2
11097	14.885	203.514	10.2153	0.21382	0.03723	0.002	200.106	0.795E-07	0.021	45.1
11096	14.886	202.912	10.2702	0.17624	0.03706	0.001	200.107	0.761E-07	0.013	46.8
11095	14.886	202.493	10.3085	0.15025	0.03695	0.001	200.106	0.738E-07	0.010	48.0
11094	14.887	202.236	10.3327	0.13447	0.03697	0.001	200.106	0.731E-07	0.008	48.5
11093	16.071	203.360	10.9342	0.21390	0.03878	0.002	200.109	0.751E-07	0.017	46.6
11092	16.070	202.779	10.9886	0.17627	0.03868	0.001	200.108	0.721E-07	0.008	48.3
11091	16.070	202.384	11.0260	0.15032	0.03877	0.001	200.110	0.723E-07	0.010	48.1
11090	16.070	202.134	11.0499	0.13427	0.03874	0.001	200.109	0.708E-07	0.007	49.1
11089	16.816	203.551	11.3356	0.23384	0.03989	0.002	200.103	0.738E-07	0.019	47.0
11088	16.817	202.957	11.3929	0.19446	0.03983	0.001	200.103	0.709E-07	0.012	48.8
11087	16.817	202.689	11.4187	0.17613	0.03983	0.001	200.105	0.710E-07	0.008	48.6
11086	16.817	202.307	11.4558	0.15037	0.03984	0.001	200.102	0.705E-07	0.007	48.9
11085	17.996	203.367	11.9818	0.23390	0.04132	0.001	200.103	0.691E-07	0.012	49.4
11084	17.996	202.838	12.0335	0.19450	0.04149	0.001	200.104	0.700E-07	0.009	48.8
11083	17.995	202.578	12.0589	0.17613	0.04153	0.001	200.105	0.708E-07	0.008	48.2
11082	17.996	202.213	12.0955	0.15028	0.04152	0.001	200.107	0.692E-07	0.007	49.2
11081	19.048	203.571	12.4870	0.25484	0.04299	0.002	200.108	0.708E-07	0.017	48.2
11080	19.047	203.141	12.5289	0.22357	0.04284	0.001	200.107	0.684E-07	0.009	49.6
11079	19.048	202.736	12.5691	0.19436	0.04303	0.001	200.106	0.688E-07	0.009	49.4
11078	19.047	202.364	12.6058	0.16724	0.04302	0.001	200.108	0.678E-07	0.008	50.0
11077	20.332	203.428	13.0985	0.25476	0.04466	0.002	200.102	0.697E-07	0.013	48.5
11076	20.331	203.015	13.1390	0.22354	0.04457	0.001	200.105	0.671E-07	0.006	50.2
11075	20.332	202.635	13.1772	0.19439	0.04480	0.001	200.105	0.694E-07	0.008	48.7

74	20.332	202.275	13.2132	0.16725	0.04475	0.001	200.107	0.675E-07	0.007	50.0
73	21.472	203.452	13.5906	0.26566	0.04623	0.001	200.101	0.696E-07	0.012	48.6
72	21.472	203.043	13.6310	0.23371	0.04613	0.001	200.100	0.675E-07	0.009	49.9
71	21.472	202.547	13.6803	0.19432	0.04624	0.001	200.101	0.683E-07	0.006	49.3
70	21.472	202.204	13.7147	0.16724	0.04628	0.001	200.102	0.680E-07	0.005	49.4
69	22.816	203.610	14.1175	0.28806	0.04799	0.001	200.107	0.700E-07	0.012	48.3
68	22.817	203.204	14.1574	0.25475	0.04777	0.001	200.108	0.678E-07	0.010	49.6
67	22.817	202.696	14.2077	0.21355	0.04803	0.001	200.109	0.689E-07	0.007	48.9
66	22.817	202.344	14.2424	0.18507	0.04804	0.001	200.108	0.681E-07	0.006	49.4
65	24.236	203.637	14.6453	0.29952	0.04974	0.001	200.121	0.702E-07	0.011	48.2
64	24.236	203.237	14.6842	0.26556	0.04968	0.001	200.123	0.687E-07	0.009	49.1
63	24.236	202.732	14.7335	0.22346	0.04965	0.001	200.124	0.668E-07	0.005	50.3
62	24.236	202.400	14.7660	0.19431	0.04953	0.001	200.120	0.682E-07	0.005	49.0
61	25.761	203.535	15.1812	0.29950	0.05159	0.001	200.138	0.701E-07	0.008	48.3
60	25.759	203.141	15.2185	0.26555	0.05184	0.001	200.137	0.718E-07	0.012	47.4
59	25.762	202.662	15.2655	0.22347	0.05162	0.001	200.138	0.690E-07	0.006	48.9
58	25.762	202.326	15.2979	0.19432	0.05168	0.001	200.139	0.677E-07	0.004	49.9
57	27.146	203.413	15.6363	0.29964	0.05316	0.001	200.117	0.698E-07	0.008	48.6
56	27.147	203.037	15.6721	0.26568	0.05308	0.001	200.121	0.688E-07	0.008	49.2
55	27.147	202.564	15.7172	0.22357	0.05318	0.000	200.120	0.674E-07	0.004	50.2
54	27.148	202.244	15.7480	0.19441	0.05331	0.000	200.120	0.680E-07	0.004	49.8
53	28.902	203.568	16.1423	0.32346	0.05524	0.001	200.127	0.719E-07	0.009	47.5
52	28.903	203.191	16.1777	0.28812	0.05517	0.001	200.126	0.704E-07	0.007	48.4
51	28.904	202.720	16.2218	0.24417	0.05519	0.001	200.129	0.696E-07	0.005	48.9
50	28.903	202.396	16.2519	0.21362	0.05531	0.000	200.127	0.701E-07	0.003	48.5
49	31.013	203.427	16.7278	0.32343	0.05759	0.001	200.126	0.725E-07	0.008	47.5
48	31.013	203.059	16.7613	0.28810	0.05753	0.001	200.125	0.705E-07	0.006	48.7
47	31.014	202.612	16.8023	0.24415	0.05764	0.000	200.126	0.712E-07	0.004	48.2
46	31.015	202.293	16.8316	0.21363	0.05770	0.000	200.126	0.709E-07	0.003	48.4
45	32.942	203.544	17.1971	0.34807	0.05975	0.001	200.113	0.736E-07	0.008	47.2
44	32.942	203.176	17.2298	0.31137	0.05965	0.001	200.114	0.723E-07	0.006	48.0
43	32.943	202.719	17.2706	0.26565	0.05975	0.000	200.114	0.720E-07	0.003	48.1
42	32.945	202.411	17.2986	0.23376	0.05984	0.000	200.115	0.734E-07	0.003	47.2
41	35.019	203.415	17.6849	0.34803	0.06200	0.001	200.108	0.746E-07	0.006	47.1
40	35.021	203.064	17.7158	0.31132	0.06199	0.001	200.109	0.738E-07	0.005	47.5
39	35.022	202.624	17.7542	0.26560	0.06203	0.000	200.109	0.733E-07	0.003	47.8
38	35.023	202.310	17.7818	0.23372	0.06211	0.000	200.109	0.723E-07	0.002	48.4
37	37.770	203.669	18.2405	0.38687	0.06476	0.001	200.127	0.766E-07	0.006	46.5
36	37.769	203.303	18.2711	0.34811	0.06477	0.001	200.129	0.752E-07	0.005	47.3
35	37.769	202.974	18.2987	0.31175	0.06476	0.000	200.128	0.751E-07	0.004	47.2
34	37.768	202.649	18.3258	0.27722	0.06482	0.000	200.128	0.739E-07	0.002	48.0
33	40.748	203.632	18.8103	0.40098	0.06773	0.001	200.121	0.774E-07	0.005	46.7
32	40.747	203.278	18.8390	0.36075	0.06772	0.000	200.122	0.778E-07	0.004	46.4
31	40.745	202.945	18.8658	0.32338	0.06778	0.000	200.121	0.764E-07	0.003	47.1
30	40.743	202.635	18.8907	0.28809	0.06784	0.000	200.121	0.770E-07	0.002	46.7
29	42.923	203.523	19.2007	0.40010	0.06983	0.000	200.116	0.788E-07	0.004	46.3
28	42.927	203.188	19.2281	0.36062	0.06985	0.000	200.118	0.787E-07	0.004	46.3
27	42.926	202.865	19.2536	0.32327	0.06990	0.000	200.117	0.786E-07	0.003	46.3
26	42.920	202.563	19.2767	0.28799	0.06993	0.000	200.133	0.798E-07	0.002	45.6
25	45.991	203.422	19.7072	0.40015	0.07269	0.000	200.135	0.799E-07	0.003	46.4
24	45.991	203.088	19.7330	0.36116	0.07265	0.000	200.134	0.789E-07	0.002	46.8
23	45.990	202.792	19.7557	0.32329	0.07280	0.000	200.134	0.794E-07	0.002	46.6
22	45.987	202.482	19.7796	0.28804	0.07291	0.000	200.134	0.793E-07	0.002	46.6
21	49.729	203.603	20.2482	0.44156	0.07592	0.000	200.130	0.807E-07	0.001	46.6
20	49.728	203.167	20.2807	0.38666	0.07616	0.000	200.131	0.812E-07	0.002	46.4
19	49.726	202.757	20.3112	0.33550	0.07625	0.000	200.132	0.823E-07	0.002	45.8
18	49.724	202.385	20.3389	0.28803	0.07636	0.000	200.133	0.823E-07	0.002	45.8
17	53.717	203.561	20.7901	0.45576	0.07957	0.000	200.125	0.846E-07	0.002	45.4
16	53.717	202.928	20.8360	0.37344	0.07957	0.000	200.126	0.833E-07	0.002	46.0
15	53.714	202.462	20.8696	0.31123	0.07997	0.000	200.123	0.864E-07	0.002	44.5
14	53.710	202.029	20.9007	0.25469	0.08000	0.000	200.126	0.841E-07	0.002	45.6
13	58.349	203.626	21.3546	0.48488	0.08343	0.000	200.129	0.856E-07	0.002	45.8
12	58.346	203.106	21.3907	0.41351	0.08357	0.000	200.126	0.861E-07	0.003	45.6
11	58.344	202.628	21.4240	0.34773	0.08367	0.000	200.129	0.866E-07	0.002	45.3
10	58.342	202.183	21.4550	0.28783	0.08386	0.000	200.132	0.847E-07	0.002	46.3
9	63.155	203.472	21.9023	0.48471	0.08741	0.000	200.128	0.881E-07	0.002	45.5
8	63.155	202.967	21.9364	0.41338	0.08756	0.000	200.133	0.888E-07	0.002	45.2
7	63.150	202.519	21.9663	0.34813	0.08760	0.000	200.133	0.887E-07	0.002	45.1
6	63.147	202.103	21.9944	0.28825	0.08781	0.000	200.130	0.889E-07	0.002	45.0
5	67.954	203.313	22.4039	0.48507	0.09128	0.000	200.099	0.909E-07	0.002	45.1
4	67.962	202.831	22.4363	0.41349	0.09142	0.000	200.099	0.901E-07	0.002	45.4
3	67.961	202.397	22.4648	0.34763	0.09173	0.000	200.101	0.938E-07	0.002	43.7

11002	67.957	202.065	22.4864	0.29926	0.09176	0.000	200.104	0.925E-07	0.002	44.2
11001	67.955	201.839	22.5010	0.26536	0.09162	0.000	200.104	0.890E-07	0.004	45.9

Nominal Temperature 228. K

Run Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)		
10160	0.976	229.006	0.5189	0.09361	0.02227	0.001	225.202	0.229E-05	0.017	18.2
10159	0.976	228.596	0.5198	0.08347	0.02205	0.001	225.204	0.205E-05	0.017	20.1
10158	0.977	228.063	0.5215	0.07089	0.02208	0.001	225.205	0.209E-05	0.017	19.8
10157	0.977	227.601	0.5226	0.05935	0.02213	0.002	225.206	0.227E-05	0.023	18.3
10156	2.084	229.023	1.1216	0.10431	0.02234	0.001	225.209	0.789E-06	0.011	24.5
10155	2.084	228.453	1.1248	0.09024	0.02218	0.001	225.209	0.726E-06	0.011	26.5
10154	2.084	227.986	1.1273	0.07715	0.02201	0.001	225.209	0.683E-06	0.014	28.0
10153	2.085	227.561	1.1299	0.06503	0.02226	0.001	225.208	0.832E-06	0.013	23.2
10152	2.538	228.845	1.3736	0.10436	0.02248	0.001	225.213	0.592E-06	0.008	26.9
10151	2.538	228.359	1.3770	0.09005	0.02246	0.001	225.213	0.593E-06	0.009	26.8
10150	2.538	227.895	1.3802	0.07699	0.02199	0.002	225.215	0.478E-06	0.020	32.6
10149	2.538	227.483	1.3831	0.06494	0.02238	0.001	225.213	0.607E-06	0.012	26.2
10148	3.528	228.611	1.9318	0.10419	0.02305	0.001	225.218	0.396E-06	0.008	29.4
10147	3.528	228.014	1.9379	0.09007	0.02289	0.002	225.220	0.369E-06	0.023	31.3
10146	3.529	227.729	1.9411	0.07701	0.02276	0.001	225.217	0.346E-06	0.011	33.2
10145	3.529	227.331	1.9451	0.06496	0.02273	0.002	225.220	0.371E-06	0.016	31.0
10144	4.181	228.489	2.3049	0.10418	0.02352	0.001	225.232	0.327E-06	0.008	30.5
10143	4.181	227.986	2.3113	0.09008	0.02342	0.002	225.231	0.315E-06	0.016	31.5
10142	4.181	227.591	2.3162	0.07700	0.02348	0.001	225.231	0.313E-06	0.014	31.8
10141	4.181	227.260	2.3209	0.06497	0.02348	0.001	225.232	0.353E-06	0.014	28.3
10140	4.957	228.685	2.7491	0.11933	0.02397	0.002	225.239	0.257E-06	0.015	33.0
10139	4.957	228.299	2.7550	0.10419	0.02405	0.001	225.239	0.262E-06	0.011	32.5
10138	4.957	227.885	2.7615	0.09008	0.02410	0.001	225.240	0.268E-06	0.012	31.9
10137	4.957	227.550	2.7667	0.07699	0.02415	0.001	225.240	0.297E-06	0.012	28.8
10136	5.976	228.616	3.3424	0.11932	0.02501	0.001	225.262	0.225E-06	0.007	32.4
10135	5.976	228.098	3.3526	0.10415	0.02494	0.002	225.263	0.221E-06	0.015	33.0
10134	5.976	227.759	3.3593	0.09006	0.02497	0.001	225.265	0.220E-06	0.012	33.1
10133	5.977	227.370	3.3676	0.07699	0.02492	0.001	225.265	0.218E-06	0.011	33.5
10132	6.894	228.178	3.8905	0.11937	0.02570	0.003	225.277	0.182E-06	0.028	35.5
10131	6.894	227.892	3.8970	0.10418	0.02556	0.002	225.276	0.178E-06	0.017	36.1
10130	6.894	227.578	3.9043	0.09010	0.02563	0.001	225.278	0.181E-06	0.008	35.6
10129	6.893	227.267	3.9113	0.07704	0.02570	0.001	225.277	0.189E-06	0.008	34.3
10128	7.776	228.563	4.3995	0.13561	0.02646	0.001	225.226	0.158E-06	0.009	37.1
10127	7.776	227.964	4.4162	0.11935	0.02651	0.001	225.227	0.162E-06	0.011	36.3
10126	7.776	227.771	4.4217	0.10428	0.02663	0.001	225.227	0.168E-06	0.006	35.2
10125	7.777	227.446	4.4312	0.09019	0.02657	0.001	225.226	0.173E-06	0.008	34.2
10124	8.883	228.374	5.0557	0.13570	0.02761	0.001	225.220	0.140E-06	0.005	38.1
10123	8.883	227.968	5.0693	0.11944	0.02770	0.001	225.221	0.144E-06	0.006	37.2
10122	8.883	227.663	5.0793	0.10425	0.02772	0.001	225.220	0.146E-06	0.007	36.7
10121	8.883	227.372	5.0889	0.09011	0.02773	0.001	225.218	0.157E-06	0.012	34.2
10120	9.857	228.736	5.6127	0.15278	0.02894	0.001	225.225	0.140E-06	0.007	36.1
10119	9.857	228.122	5.6351	0.13557	0.02855	0.000	225.224	0.125E-06	0.004	39.9
10118	9.857	227.782	5.6477	0.11935	0.02868	0.001	225.225	0.129E-06	0.006	38.7
10117	9.857	227.564	5.6560	0.10416	0.02873	0.001	225.227	0.141E-06	0.007	35.5
10116	10.596	228.350	6.0557	0.15267	0.02928	0.001	225.215	0.117E-06	0.005	40.3
10115	10.597	228.030	6.0691	0.13548	0.02943	0.001	225.217	0.121E-06	0.005	39.4
10114	10.597	227.703	6.0823	0.11980	0.02949	0.001	225.218	0.122E-06	0.005	39.1
10113	10.598	227.415	6.0947	0.10416	0.02941	0.001	225.216	0.127E-06	0.006	37.4
10112	11.490	228.730	6.5519	0.17101	0.03044	0.001	225.210	0.115E-06	0.011	39.5
10111	11.490	228.244	6.5733	0.15278	0.03013	0.001	225.212	0.106E-06	0.009	42.6
10110	11.490	227.997	6.5843	0.13560	0.03042	0.000	225.209	0.112E-06	0.003	40.4
10109	11.492	227.695	6.5986	0.11937	0.03048	0.001	225.210	0.120E-06	0.007	37.9
10108	12.538	228.392	7.1573	0.17099	0.03126	0.001	225.209	0.975E-07	0.009	43.9
10107	12.538	228.106	7.1713	0.15280	0.03154	0.000	225.210	0.105E-06	0.004	41.3
10106	12.538	227.778	7.1873	0.13558	0.03160	0.001	225.207	0.105E-06	0.005	41.1
10105	12.539	227.485	7.2025	0.11937	0.03159	0.001	225.208	0.110E-06	0.005	39.3
10104	13.444	228.687	7.6422	0.19017	0.03230	0.001	225.209	0.948E-07	0.006	43.7
10103	13.444	228.331	7.6608	0.17090	0.03237	0.001	225.209	0.960E-07	0.005	43.2
10102	13.445	227.990	7.6790	0.15266	0.03260	0.001	225.213	0.996E-07	0.005	41.9
10101	13.445	227.681	7.6954	0.13581	0.03254	0.001	225.211	0.101E-06	0.006	41.3
10100	14.394	228.736	8.1497	0.20045	0.03341	0.001	225.213	0.913E-07	0.008	44.0
10099	14.394	228.389	8.1692	0.18042	0.03347	0.001	225.214	0.924E-07	0.005	43.5
10098	14.394	228.061	8.1874	0.16169	0.03369	0.000	225.215	0.959E-07	0.004	42.3

10097	14.395	227.741	8.2057	0.14398	0.03357	0.001	225.213	0.974E-07	0.005	41.4
10096	15.416	228.725	8.6838	0.20020	0.03486	0.001	225.214	0.935E-07	0.012	42.1
10095	15.416	228.265	8.7109	0.18046	0.03481	0.001	225.217	0.921E-07	0.004	42.7
10094	15.415	227.944	8.7295	0.16169	0.03478	0.001	225.216	0.897E-07	0.011	43.8
10093	15.415	227.679	8.7453	0.14399	0.03485	0.001	225.215	0.957E-07	0.006	41.1
10092	16.424	228.638	9.1985	0.21041	0.03573	0.001	225.214	0.847E-07	0.008	45.1
10091	16.425	228.318	9.2185	0.19013	0.03604	0.000	225.216	0.894E-07	0.004	43.1
10090	16.425	228.007	9.2381	0.17088	0.03601	0.001	225.213	0.904E-07	0.011	42.5
10089	16.426	227.784	9.2524	0.15273	0.03628	0.001	225.214	0.949E-07	0.008	40.8
10088	17.567	228.619	9.7550	0.21050	0.03738	0.001	225.227	0.867E-07	0.011	43.5
10087	17.566	228.300	9.7755	0.19018	0.03731	0.001	225.226	0.872E-07	0.009	43.2
10086	17.566	227.912	9.8007	0.17096	0.03721	0.000	225.225	0.837E-07	0.004	44.8
10085	17.567	227.648	9.8182	0.15274	0.03723	0.001	225.224	0.875E-07	0.005	42.8
10084	18.752	228.529	10.3122	0.22103	0.03836	0.001	225.212	0.798E-07	0.005	46.0
10083	18.752	228.259	10.3304	0.20026	0.03838	0.001	225.214	0.797E-07	0.005	46.0
10082	18.752	228.141	10.3383	0.18049	0.03885	0.001	225.213	0.877E-07	0.011	42.4
10081	18.752	227.688	10.3690	0.16178	0.03865	0.001	225.214	0.848E-07	0.004	43.5
10080	20.010	228.393	10.8791	0.22099	0.03964	0.001	225.210	0.765E-07	0.005	47.1
10079	20.010	228.209	10.8919	0.20021	0.04000	0.001	225.212	0.801E-07	0.007	45.3
10078	20.010	227.870	10.9154	0.18042	0.04005	0.000	225.212	0.807E-07	0.004	45.0
10077	20.010	227.586	10.9353	0.16169	0.04011	0.000	225.211	0.828E-07	0.004	43.9
10076	21.320	228.288	11.4365	0.22093	0.04109	0.000	225.223	0.745E-07	0.004	47.7
10075	21.320	228.061	11.4526	0.20052	0.04142	0.000	225.225	0.787E-07	0.003	45.5
10074	21.319	227.819	11.4696	0.18036	0.04163	0.001	225.226	0.809E-07	0.007	44.5
10073	21.319	227.552	11.4887	0.16164	0.04138	0.001	225.224	0.800E-07	0.007	44.7
10072	22.753	228.149	12.0148	0.22080	0.04269	0.001	225.204	0.733E-07	0.004	48.0
10071	22.753	227.958	12.0286	0.20003	0.04289	0.001	225.195	0.754E-07	0.006	46.9
10070	22.752	227.653	12.0507	0.18026	0.04312	0.000	225.206	0.784E-07	0.004	45.3
10069	22.752	227.437	12.0661	0.16160	0.04325	0.001	225.206	0.787E-07	0.005	45.2
10068	24.306	228.476	12.5684	0.25403	0.04441	0.001	225.225	0.739E-07	0.004	47.4
10067	24.306	228.049	12.5997	0.22078	0.04441	0.000	225.217	0.737E-07	0.004	47.5
10066	24.306	227.669	12.6277	0.19007	0.04467	0.000	225.218	0.768E-07	0.004	45.8
10065	24.305	227.499	12.6402	0.17090	0.04484	0.001	225.219	0.812E-07	0.005	43.5
10064	25.817	228.777	13.0729	0.27737	0.04641	0.001	225.215	0.793E-07	0.009	44.4
10063	25.817	228.139	13.1199	0.23169	0.04641	0.001	225.220	0.798E-07	0.009	44.1
10062	25.817	227.637	13.1572	0.19014	0.04643	0.000	225.222	0.774E-07	0.004	45.4
10061	25.817	227.409	13.1739	0.17087	0.04629	0.000	225.221	0.777E-07	0.004	45.0
10060	27.654	228.586	13.6839	0.27737	0.04801	0.001	225.224	0.755E-07	0.005	46.2
10059	27.654	228.071	13.7220	0.23167	0.04821	0.001	225.223	0.759E-07	0.004	46.1
10058	27.653	227.518	13.7628	0.19010	0.04835	0.000	225.226	0.779E-07	0.004	44.9
10057	27.652	227.411	13.7703	0.17088	0.04838	0.001	225.229	0.779E-07	0.006	44.9
10056	29.263	228.429	14.1828	0.27733	0.04979	0.000	225.217	0.753E-07	0.003	46.4
10055	29.262	227.928	14.2197	0.23168	0.04993	0.000	225.218	0.787E-07	0.003	44.4
10054	29.261	227.483	14.2526	0.19013	0.05000	0.001	225.219	0.772E-07	0.004	45.3
10053	29.260	227.246	14.2698	0.17088	0.05001	0.001	225.218	0.774E-07	0.008	45.1
10052	31.260	228.639	14.7313	0.30181	0.05162	0.000	225.216	0.765E-07	0.003	45.6
10051	31.260	228.317	14.7549	0.27737	0.05160	0.000	225.214	0.761E-07	0.003	45.8
10050	31.259	227.878	14.7868	0.23184	0.05168	0.001	225.217	0.745E-07	0.004	46.8
10049	31.258	227.426	14.8202	0.19040	0.05201	0.000	225.218	0.801E-07	0.003	43.7
10048	32.751	228.640	15.1252	0.30176	0.05297	0.001	225.234	0.759E-07	0.007	46.0
10047	32.751	228.361	15.1455	0.27740	0.05322	0.001	225.234	0.784E-07	0.005	44.7
10046	32.751	227.853	15.1827	0.23169	0.05330	0.000	225.235	0.778E-07	0.003	45.0
10045	32.749	227.375	15.2174	0.19016	0.05334	0.000	225.232	0.811E-07	0.003	43.1
10044	34.973	228.725	15.6680	0.32708	0.05531	0.000	225.233	0.789E-07	0.003	44.6
10043	34.972	228.566	15.6793	0.30167	0.05536	0.001	225.232	0.786E-07	0.005	44.8
10042	34.971	227.981	15.7214	0.25397	0.05529	0.000	225.234	0.770E-07	0.003	45.6
10041	34.971	227.501	15.7562	0.21036	0.05553	0.000	225.237	0.797E-07	0.003	44.2
10040	37.623	228.640	16.2764	0.32708	0.05780	0.000	225.230	0.796E-07	0.004	44.5
10039	37.622	228.484	16.2873	0.30191	0.05806	0.001	225.227	0.820E-07	0.007	43.4
10038	37.621	227.863	16.3314	0.25414	0.05744	0.001	225.230	0.738E-07	0.006	47.6
10037	37.620	227.499	16.3572	0.21051	0.05791	0.001	225.232	0.794E-07	0.004	44.6
10036	39.799	228.729	16.7274	0.35380	0.05949	0.000	225.224	0.779E-07	0.002	45.6
10035	39.801	228.252	16.7611	0.30194	0.05983	0.000	225.225	0.794E-07	0.003	45.0
10034	39.800	227.812	16.7919	0.25421	0.05963	0.001	225.223	0.761E-07	0.005	46.7
10033	39.798	227.328	16.8257	0.21056	0.05979	0.000	225.224	0.782E-07	0.003	45.4
10032	43.256	228.673	17.3982	0.36754	0.06230	0.001	225.208	0.756E-07	0.005	47.4
10031	43.256	228.248	17.4274	0.31510	0.06282	0.000	225.210	0.801E-07	0.002	45.0
10030	43.253	227.760	17.4604	0.26538	0.06306	0.000	225.210	0.824E-07	0.002	43.8
10029	43.254	227.248	17.4959	0.22078	0.06280	0.000	225.210	0.803E-07	0.004	44.7
10028	46.407	228.684	17.9512	0.38089	0.06536	0.000	225.207	0.810E-07	0.002	45.0
10027	46.406	228.282	17.9781	0.32700	0.06531	0.001	225.208	0.797E-07	0.006	45.6
10026	46.405	227.771	18.0124	0.27715	0.06582	0.000	225.211	0.825E-07	0.002	44.3

10025	46.404	227.265	18.0463	0.22072	0.06580	0.000	225.210	0.844E-07	0.003	43.2
10024	49.655	228.654	18.4783	0.38081	0.06819	0.000	225.211	0.822E-07	0.004	45.0
10023	49.655	228.124	18.5131	0.32684	0.06774	0.001	225.213	0.793E-07	0.008	46.2
10022	49.656	227.668	18.5433	0.27705	0.06848	0.000	225.210	0.828E-07	0.002	44.6
10021	49.655	227.165	18.5764	0.22066	0.06841	0.000	225.211	0.825E-07	0.003	44.7
10020	52.813	228.654	18.9504	0.39490	0.07042	0.001	225.221	0.816E-07	0.009	45.6
10019	52.812	228.121	18.9846	0.34000	0.07095	0.000	225.223	0.844E-07	0.002	44.3
10018	52.813	227.642	19.0156	0.28311	0.07025	0.001	225.223	0.789E-07	0.007	46.9
10017	52.813	227.248	19.0413	0.23149	0.07089	0.000	225.221	0.843E-07	0.004	44.2
10016	55.981	228.777	19.3837	0.42372	0.07320	0.000	225.207	0.862E-07	0.003	43.9
10015	55.985	228.242	19.4180	0.36685	0.07348	0.000	225.207	0.868E-07	0.002	43.7
10014	55.979	227.750	19.4484	0.30773	0.07371	0.000	225.206	0.877E-07	0.002	43.3
10013	55.978	227.294	19.4770	0.25375	0.07390	0.000	225.209	0.899E-07	0.004	42.3
10012	59.675	228.610	19.8724	0.42355	0.07613	0.000	225.203	0.876E-07	0.003	43.9
10011	59.673	228.072	19.9055	0.36010	0.07594	0.000	225.203	0.865E-07	0.002	44.2
10010	59.671	227.636	19.9322	0.30789	0.07650	0.000	225.204	0.887E-07	0.002	43.4
10009	59.672	227.208	19.9589	0.25435	0.07631	0.000	225.203	0.880E-07	0.003	43.5
10008	63.916	228.678	20.3764	0.45465	0.07938	0.000	225.195	0.897E-07	0.002	43.6
10007	63.915	228.160	20.4074	0.38781	0.07958	0.000	225.194	0.899E-07	0.002	43.5
10006	63.915	227.748	20.4324	0.33345	0.07957	0.000	225.194	0.901E-07	0.002	43.3
10005	63.914	227.312	20.4586	0.27723	0.07968	0.000	225.194	0.899E-07	0.002	43.4
10004	68.847	228.620	20.9234	0.46944	0.08308	0.000	225.169	0.906E-07	0.002	43.9
10003	68.848	228.110	20.9534	0.40193	0.08338	0.000	225.172	0.934E-07	0.002	42.7
10002	68.850	227.704	20.9776	0.34678	0.08356	0.000	225.173	0.934E-07	0.003	42.7
10001	68.852	227.289	21.0023	0.28940	0.08356	0.000	225.169	0.936E-07	0.002	42.6

### Nominal Temperature 253. K

Run	Pt.	Pressure MPa	Temperature K	Density mol/L	Power W/m	Thermal Conductivity W/(m.K) STAT	Cell Temperature K	Thermal Diffusivity m**2/s DSTAT	Specific Heat J/(mol.K)	
9060		1.963	254.197	0.9409	0.10782	0.02392	0.001	250.636	0.942E-06	0.015
9059		1.963	253.692	0.9429	0.09273	0.02373	0.001	250.636	0.850E-06	0.012
9058		1.963	253.226	0.9448	0.07876	0.02387	0.002	250.638	0.903E-06	0.017
9057		1.963	252.814	0.9464	0.06594	0.02375	0.002	250.653	0.920E-06	0.021
9056		3.034	254.197	1.4635	0.11580	0.02442	0.001	250.629	0.577E-06	0.010
9055		3.034	253.715	1.4666	0.10012	0.02436	0.001	250.640	0.563E-06	0.012
9054		3.034	253.263	1.4695	0.08559	0.02429	0.001	250.634	0.542E-06	0.013
9053		3.035	252.863	1.4723	0.07222	0.02437	0.001	250.638	0.606E-06	0.015
9052		4.126	253.999	2.0027	0.11582	0.02496	0.001	250.636	0.403E-06	0.009
9051		4.126	253.543	2.0070	0.10015	0.02481	0.001	250.636	0.388E-06	0.012
9050		4.126	253.116	2.0110	0.08562	0.02494	0.001	250.640	0.400E-06	0.010
9049		4.126	252.737	2.0145	0.07222	0.02486	0.002	250.644	0.418E-06	0.015
9048		5.065	254.303	2.4648	0.13263	0.02553	0.001	250.635	0.321E-06	0.006
9047		5.065	253.836	2.4702	0.11586	0.02564	0.001	250.637	0.331E-06	0.009
9046		5.065	253.406	2.4753	0.10017	0.02559	0.001	250.638	0.326E-06	0.010
9045		5.065	253.005	2.4800	0.08565	0.02546	0.001	250.653	0.323E-06	0.012
9044		6.400	254.115	3.1303	0.13263	0.02651	0.001	250.667	0.260E-06	0.007
9043		6.400	253.673	3.1373	0.11584	0.02645	0.001	250.668	0.251E-06	0.007
9042		6.401	253.267	3.1439	0.10015	0.02643	0.001	250.672	0.248E-06	0.009
9041		6.401	252.901	3.1498	0.08562	0.02656	0.001	250.677	0.281E-06	0.011
9040		7.783	254.348	3.8130	0.15057	0.02758	0.001	250.669	0.216E-06	0.008
9039		7.783	253.908	3.8219	0.13261	0.02751	0.001	250.669	0.210E-06	0.007
9038		7.783	253.496	3.8299	0.11581	0.02747	0.001	250.666	0.207E-06	0.009
9037		7.784	253.125	3.8374	0.10014	0.02760	0.001	250.681	0.234E-06	0.010
9036		8.858	254.200	4.3476	0.15063	0.02843	0.001	250.687	0.187E-06	0.007
9035		8.858	253.779	4.3571	0.13267	0.02835	0.001	250.687	0.181E-06	0.007
9034		8.859	253.389	4.3662	0.11583	0.02828	0.001	250.689	0.179E-06	0.008
9033		8.859	253.029	4.3746	0.10015	0.02821	0.001	250.697	0.184E-06	0.009
9032		10.085	254.474	4.9422	0.16969	0.02946	0.001	250.709	0.166E-06	0.007
9031		10.085	254.062	4.9529	0.15062	0.02944	0.001	250.711	0.166E-06	0.006
9030		10.085	253.656	4.9635	0.13266	0.02935	0.001	250.713	0.160E-06	0.008
9029		10.085	253.283	4.9733	0.11584	0.02929	0.001	250.719	0.162E-06	0.008
9028		11.168	253.735	5.4872	0.16911	0.03030	0.001	250.142	0.149E-06	0.006
9027		11.169	253.329	5.4997	0.15012	0.03036	0.001	250.141	0.151E-06	0.007
9026		11.170	252.948	5.5117	0.13221	0.03029	0.001	250.144	0.149E-06	0.007
9025		11.172	252.592	5.5230	0.11547	0.03027	0.001	250.149	0.153E-06	0.008
9024		12.582	253.550	6.1687	0.16918	0.03163	0.001	250.144	0.137E-06	0.008
9023		12.583	253.162	6.1820	0.15018	0.03162	0.001	250.146	0.135E-06	0.007
9022		12.585	252.807	6.1947	0.13231	0.03159	0.001	250.149	0.136E-06	0.007
9021		12.586	252.467	6.2070	0.11552	0.03149	0.001	250.154	0.137E-06	0.009

9020	14.100	253.758	6.8680	0.18942	0.03266	0.001	250.135	0.117E-06	0.008	39.8
9019	14.101	252.995	6.8970	0.15020	0.03299	0.001	250.135	0.124E-06	0.007	37.9
9018	14.101	252.658	6.9096	0.13229	0.03298	0.001	250.143	0.125E-06	0.007	37.7
9017	14.105	252.338	6.9238	0.11555	0.03286	0.001	250.148	0.127E-06	0.008	37.0
9016	15.782	253.932	7.6175	0.21073	0.03413	0.001	250.124	0.108E-06	0.011	40.9
9015	15.784	253.178	7.6497	0.16922	0.03453	0.001	250.123	0.118E-06	0.006	37.7
9014	15.785	252.502	7.6789	0.13228	0.03452	0.001	250.128	0.115E-06	0.008	38.7
9013	15.789	252.204	7.6931	0.11553	0.03425	0.001	250.140	0.112E-06	0.008	39.2
9012	17.910	253.678	8.5420	0.21079	0.03626	0.001	250.110	0.102E-06	0.009	41.0
9011	17.910	252.966	8.5750	0.16925	0.03647	0.001	250.109	0.105E-06	0.006	40.0
9010	17.911	252.339	8.6044	0.13233	0.03652	0.001	250.114	0.106E-06	0.008	39.8
9009	17.911	252.059	8.6179	0.11554	0.03651	0.001	250.119	0.111E-06	0.008	37.8
9004	19.207	253.551	9.0793	0.21074	0.03769	0.001	250.107	0.102E-06	0.006	40.0
9008	19.209	253.547	9.0801	0.21067	0.03767	0.001	250.105	0.102E-06	0.006	40.1
9003	19.207	252.870	9.1124	0.16918	0.03774	0.001	250.111	0.103E-06	0.007	39.9
9007	19.208	252.863	9.1133	0.16921	0.03776	0.001	250.106	0.103E-06	0.007	39.9
9002	19.206	252.266	9.1418	0.13225	0.03774	0.001	250.110	0.102E-06	0.007	40.2
9006	19.208	252.264	9.1427	0.13225	0.03773	0.001	250.106	0.101E-06	0.007	40.4
9001	19.206	251.996	9.1552	0.11553	0.03777	0.001	250.117	0.104E-06	0.008	39.5
9005	19.208	251.989	9.1561	0.11550	0.03774	0.001	250.106	0.101E-06	0.008	40.6
9141	19.999	253.793	9.3818	0.21107	0.03832	0.001	250.411	0.102E-06	0.007	39.4
9140	20.000	253.455	9.3991	0.18972	0.03826	0.001	250.412	0.102E-06	0.008	39.5
9139	20.002	253.126	9.4162	0.16954	0.03820	0.001	250.413	0.999E-07	0.007	40.1
9138	20.003	252.829	9.4314	0.15048	0.03821	0.001	250.422	0.106E-06	0.007	38.0
9137	21.408	253.657	9.9291	0.21113	0.03956	0.001	250.402	0.972E-07	0.007	40.5
9136	21.408	253.332	9.9463	0.18977	0.03957	0.001	250.402	0.986E-07	0.007	39.9
9135	21.409	253.016	9.9630	0.16957	0.03951	0.001	250.404	0.957E-07	0.008	41.0
9134	21.411	252.729	9.9788	0.15049	0.03956	0.001	250.410	0.103E-06	0.007	38.0
9133	23.047	253.524	10.5355	0.21110	0.04101	0.001	250.398	0.937E-07	0.006	41.1
9132	23.047	253.204	10.5529	0.18977	0.04107	0.001	250.398	0.938E-07	0.006	41.1
9131	23.049	252.900	10.5699	0.16955	0.04107	0.001	250.401	0.923E-07	0.007	41.7
9130	23.050	252.628	10.5850	0.15048	0.04079	0.001	250.412	0.937E-07	0.008	40.8
9129	24.725	253.712	11.1063	0.23363	0.04259	0.001	250.391	0.924E-07	0.006	41.0
9128	24.725	253.393	11.1240	0.21115	0.04257	0.001	250.393	0.914E-07	0.006	41.5
9127	24.726	253.099	11.1409	0.18978	0.04265	0.001	250.393	0.951E-07	0.006	39.9
9126	24.729	252.806	11.1579	0.16958	0.04266	0.001	250.396	0.934E-07	0.006	40.6
9125	26.566	253.912	11.6961	0.25716	0.04402	0.001	250.389	0.886E-07	0.006	42.0
9124	26.566	253.589	11.7144	0.23356	0.04401	0.001	250.389	0.883E-07	0.004	42.2
9123	26.566	253.279	11.7321	0.21106	0.04417	0.001	250.390	0.897E-07	0.006	41.6
9122	26.566	252.994	11.7484	0.18975	0.04411	0.001	250.401	0.934E-07	0.006	39.9
9121	28.596	253.774	12.3254	0.25710	0.04588	0.001	250.392	0.883E-07	0.007	41.8
9120	28.595	253.465	12.3431	0.23340	0.04593	0.001	250.396	0.890E-07	0.005	41.5
9119	28.595	253.173	12.3599	0.21097	0.04595	0.001	250.396	0.899E-07	0.005	41.1
9118	28.593	252.895	12.3756	0.18963	0.04588	0.001	250.404	0.919E-07	0.006	40.1
9116	31.123	253.634	13.0516	0.25715	0.04809	0.001	250.417	0.872E-07	0.005	42.0
9117	31.124	253.616	13.0528	0.25716	0.05029	0.012	250.416	0.122E-06	0.108	31.5
9115	31.123	253.198	13.0772	0.22219	0.04808	0.001	250.428	0.870E-07	0.005	42.0
9114	31.122	252.798	13.1004	0.18972	0.04790	0.001	250.427	0.883E-07	0.006	41.2
9189	32.934	253.725	13.5260	0.27245	0.04966	0.000	250.408	0.858E-07	0.004	42.5
9188	32.933	253.422	13.5434	0.24797	0.04975	0.000	250.408	0.863E-07	0.003	42.3
9187	32.932	253.141	13.5598	0.22466	0.04975	0.000	250.407	0.864E-07	0.004	42.3
9186	32.931	252.756	13.5825	0.19187	0.04985	0.000	250.408	0.943E-07	0.003	38.8
9113	33.589	254.097	13.6708	0.30776	0.05014	0.001	250.409	0.856E-07	0.006	42.6
9112	33.588	253.635	13.6978	0.26937	0.05019	0.000	250.409	0.861E-07	0.004	42.3
9111	33.586	253.208	13.7225	0.23349	0.05028	0.001	250.408	0.873E-07	0.005	41.8
9110	33.584	252.810	13.7458	0.20021	0.04939	0.002	250.418	0.773E-07	0.015	46.3
9185	34.982	253.621	14.0428	0.27237	0.05146	0.000	250.418	0.862E-07	0.004	42.3
9184	34.981	253.337	14.0592	0.24853	0.05151	0.000	250.421	0.870E-07	0.003	41.9
9183	34.980	253.066	14.0751	0.22533	0.05154	0.000	250.423	0.861E-07	0.002	42.4
9182	34.979	252.680	14.0977	0.19258	0.05162	0.000	250.424	0.866E-07	0.003	42.1
9109	36.189	254.113	14.3002	0.32095	0.05200	0.000	250.427	0.838E-07	0.004	43.1
9108	36.191	253.662	14.3271	0.28169	0.05182	0.001	250.428	0.815E-07	0.008	44.1
9107	36.191	253.237	14.3524	0.24500	0.05235	0.001	250.429	0.879E-07	0.005	41.3
9106	36.193	252.837	14.3766	0.21092	0.05174	0.001	250.434	0.810E-07	0.008	44.3
9181	37.385	253.497	14.6102	0.27240	0.05346	0.000	250.419	0.875E-07	0.004	41.7
9180	37.383	253.232	14.6255	0.24794	0.05350	0.000	250.422	0.891E-07	0.003	40.9
9179	37.380	252.969	14.6404	0.22470	0.05294	0.001	250.423	0.819E-07	0.008	44.0
9178	37.379	252.586	14.6628	0.19192	0.05352	0.000	250.424	0.879E-07	0.004	41.4
9105	38.144	253.996	14.7497	0.32090	0.05390	0.001	250.414	0.876E-07	0.005	41.5
9104	38.145	253.554	14.7759	0.28169	0.05379	0.001	250.416	0.853E-07	0.006	42.5
9103	38.146	253.136	14.8007	0.24501	0.05396	0.001	250.422	0.861E-07	0.005	42.2
9102	38.149	252.763	14.8236	0.21096	0.05375	0.001	250.427	0.883E-07	0.006	40.9

9177	39.869	253.660	15.1397	0.29791	0.05519	0.000	250.408	0.844E-07	0.002	43.1
9176	39.870	253.236	15.1650	0.25991	0.05512	0.001	250.408	0.813E-07	0.006	44.6
9175	39.869	252.851	15.1874	0.22455	0.05552	0.000	250.412	0.861E-07	0.002	42.3
9174	39.869	252.503	15.2081	0.19178	0.05527	0.000	250.411	0.874E-07	0.004	41.5
9101	40.582	254.008	15.2673	0.33468	0.05589	0.001	250.407	0.862E-07	0.005	42.3
9100	40.592	253.578	15.2945	0.29459	0.05598	0.001	250.411	0.876E-07	0.005	41.7
9099	40.588	253.168	15.3178	0.25711	0.05598	0.001	250.418	0.871E-07	0.005	41.8
9098	40.589	252.799	15.3399	0.22267	0.05620	0.001	250.421	0.904E-07	0.006	40.4
9173	42.412	253.983	15.6356	0.33871	0.05669	0.001	250.414	0.803E-07	0.009	45.0
9172	42.413	253.412	15.6691	0.28519	0.05716	0.000	250.414	0.837E-07	0.003	43.4
9097	42.646	254.047	15.6775	0.34900	0.05687	0.001	250.396	0.795E-07	0.008	45.5
9171	42.414	252.886	15.7001	0.23607	0.05719	0.001	250.414	0.819E-07	0.007	44.4
9096	42.647	253.606	15.7033	0.30781	0.05738	0.000	250.395	0.843E-07	0.004	43.2
9095	42.649	253.206	15.7271	0.26940	0.05765	0.001	250.397	0.872E-07	0.004	41.9
9170	42.414	252.420	15.7275	0.19178	0.05698	0.002	250.411	0.818E-07	0.017	44.2
9094	42.650	252.837	15.7489	0.23356	0.05760	0.001	250.413	0.909E-07	0.005	40.2
9169	45.457	253.995	16.2073	0.35246	0.05945	0.000	250.420	0.856E-07	0.003	42.8
9168	45.457	253.434	16.2398	0.29786	0.05911	0.001	250.419	0.804E-07	0.008	45.2
9167	45.457	252.922	16.2694	0.24786	0.05962	0.000	250.423	0.836E-07	0.004	43.8
9166	45.457	252.465	16.2961	0.20247	0.05934	0.001	250.424	0.817E-07	0.005	44.5
9093	46.052	253.907	16.3191	0.34889	0.05991	0.001	250.403	0.853E-07	0.006	42.9
9092	46.050	253.489	16.3429	0.30776	0.05958	0.001	250.405	0.804E-07	0.012	45.2
9091	46.050	253.103	16.3652	0.26931	0.06026	0.000	250.407	0.872E-07	0.004	42.2
9090	46.048	252.750	16.3854	0.23345	0.06029	0.001	250.415	0.931E-07	0.005	39.5
9165	48.481	253.865	16.7417	0.35366	0.06178	0.000	250.407	0.862E-07	0.003	42.7
9089	48.619	253.790	16.7690	0.34867	0.06193	0.000	250.395	0.860E-07	0.004	42.9
9164	48.482	253.318	16.7731	0.29827	0.06176	0.000	250.409	0.844E-07	0.003	43.6
9088	48.617	253.385	16.7919	0.30773	0.06160	0.001	250.400	0.823E-07	0.013	44.5
9163	48.484	252.833	16.8012	0.24818	0.06214	0.001	250.409	0.850E-07	0.005	43.5
9087	48.616	253.010	16.8132	0.26937	0.06231	0.001	250.401	0.886E-07	0.005	41.8
9162	48.484	252.383	16.8271	0.20273	0.06213	0.001	250.410	0.901E-07	0.010	41.0
9086	48.616	252.668	16.8328	0.23356	0.06189	0.001	250.406	0.874E-07	0.010	42.0
9085	51.672	254.089	17.2456	0.39216	0.06398	0.000	250.399	0.858E-07	0.004	43.2
9084	51.671	253.541	17.2763	0.33477	0.06403	0.000	250.403	0.845E-07	0.003	43.8
9161	51.790	253.864	17.2767	0.36732	0.06405	0.001	250.412	0.842E-07	0.006	44.0
9083	51.671	253.042	17.3045	0.28190	0.06405	0.001	250.401	0.841E-07	0.005	44.0
9082	51.669	252.593	17.3297	0.23358	0.06437	0.001	250.411	0.918E-07	0.006	40.4
9160	51.791	252.854	17.3338	0.26030	0.06472	0.000	250.414	0.877E-07	0.002	42.6
9159	51.793	252.632	17.3467	0.23641	0.06477	0.000	250.415	0.875E-07	0.002	42.6
9158	51.794	252.425	17.3587	0.21370	0.06437	0.000	250.415	0.882E-07	0.004	42.0
9081	54.395	254.145	17.6553	0.40764	0.06592	0.001	250.427	0.858E-07	0.005	43.5
9080	54.395	253.607	17.6853	0.34901	0.06555	0.001	250.429	0.807E-07	0.008	45.9
9079	54.395	253.105	17.7133	0.29497	0.06648	0.000	250.431	0.878E-07	0.004	42.7
9078	54.393	252.665	17.7376	0.24543	0.06638	0.001	250.439	0.914E-07	0.006	40.9
9157	55.894	253.980	17.8816	0.39696	0.06709	0.000	250.402	0.870E-07	0.003	43.1
9156	55.895	253.453	17.9110	0.33884	0.06709	0.000	250.403	0.846E-07	0.003	44.3
9155	55.897	252.960	17.9386	0.28532	0.06746	0.000	250.405	0.864E-07	0.003	43.5
9154	55.897	252.528	17.9627	0.23643	0.06739	0.000	250.406	0.883E-07	0.003	42.5
9077	58.192	253.984	18.2017	0.40751	0.06855	0.001	250.410	0.859E-07	0.004	43.9
9076	58.191	253.461	18.2302	0.34888	0.06855	0.001	250.413	0.845E-07	0.005	44.5
9075	58.189	252.983	18.2563	0.29447	0.06917	0.000	250.418	0.912E-07	0.004	41.6
9074	58.187	252.562	18.2791	0.24501	0.06919	0.001	250.421	0.949E-07	0.005	39.9
9153	60.180	253.823	18.4760	0.39682	0.06986	0.001	250.408	0.834E-07	0.006	45.4
9152	60.181	253.319	18.5036	0.33873	0.07042	0.000	250.409	0.875E-07	0.003	43.5
9151	60.182	252.862	18.5285	0.28522	0.07078	0.000	250.413	0.905E-07	0.002	42.2
9150	60.181	252.445	18.5512	0.23633	0.07096	0.000	250.415	0.916E-07	0.002	41.8
9073	61.642	253.994	18.6557	0.42246	0.07117	0.001	250.409	0.888E-07	0.005	43.0
9072	61.640	253.480	18.6831	0.36276	0.07040	0.002	250.410	0.810E-07	0.015	46.5
9071	61.641	253.009	18.7087	0.30770	0.07177	0.000	250.415	0.927E-07	0.004	41.4
9070	61.637	252.578	18.7317	0.25703	0.07158	0.001	250.419	0.926E-07	0.005	41.3
9149	64.301	253.946	18.9891	0.42760	0.07297	0.001	250.417	0.872E-07	0.005	44.1
9148	64.302	253.435	19.0164	0.36699	0.07335	0.000	250.421	0.891E-07	0.004	43.3
9147	64.303	252.983	19.0408	0.31128	0.07366	0.001	250.410	0.927E-07	0.005	41.8
9146	64.302	252.518	19.0657	0.25910	0.07230	0.005	250.413	0.795E-07	0.039	47.7
9069	65.376	254.000	19.1155	0.43826	0.07352	0.001	250.415	0.875E-07	0.005	44.0
9068	65.374	253.372	19.1486	0.36293	0.07334	0.001	250.415	0.843E-07	0.009	45.5
9067	65.371	252.930	19.1718	0.30769	0.07431	0.000	250.416	0.951E-07	0.004	40.8
9066	65.367	252.498	19.1944	0.25701	0.07396	0.001	250.421	0.869E-07	0.005	44.4
9145	68.381	253.901	19.4698	0.44247	0.07567	0.000	250.393	0.883E-07	0.004	44.1
9144	68.382	253.428	19.4947	0.38108	0.07642	0.000	250.397	0.922E-07	0.001	42.5
9065	68.749	253.879	19.5125	0.43809	0.07605	0.000	250.403	0.895E-07	0.003	43.6
9143	68.383	252.967	19.5191	0.32344	0.07662	0.000	250.398	0.940E-07	0.002	41.8

9142	68.383	252.554	19.5409	0.27144	0.07675	0.000	250.397	0.941E-07	0.002	41.8
9064	68.746	253.279	19.5436	0.36279	0.07661	0.000	250.402	0.934E-07	0.003	42.0
9063	68.739	252.841	19.5659	0.30767	0.07688	0.000	250.403	0.961E-07	0.004	40.9
9062	68.731	252.433	19.5864	0.25701	0.07681	0.001	250.405	0.931E-07	0.006	42.2
9061	68.731	252.254	19.5958	0.23342	0.07692	0.001	250.412	0.964E-07	0.006	40.7

#### 4. References

- [1] Roder, H.M., Nieto de Castro, C.A., Mardolcar, U.V. The thermal conductivity of liquid argon for temperatures between 110 and 140 K with pressures to 70 MPa. Internat. J. Thermophys. 8(5): 521-540; 1987 September.
- [2] Roder, H.M., Nieto de Castro, C.A. Heat capacity,  $C_p$ , of fluids from transient hot wire measurements. Cryogenics 27:312-313; 1987 June.
- [3] Roder, H.M., Nieto de Castro, C.A. Measurement of thermal conductivity and thermal diffusivity of fluids over a wide range of densities. Paper presented at the 20th Internat. Thermal Cond. Conf.; 1987 Oct 10-21, Blacksburg, Virginia.
- [4] Roder, H.M., Nieto de Castro, C.A., Perkins, R.A. Thermal conductivity, thermal diffusivity, and heat capacity of nitrogen from transient hot wire measurements. Paper presented at the 10th Symposium on Thermophysical Properties; 1988 June 20-23, Gaithersburg, Maryland.
- [5] Roder, H.M. A transient hot wire thermal conductivity apparatus for fluids. J. Res. Nat. Bur. Stand.(U.S.). 86(5): 457-493; 1981 September-October.
- [6] de Castro, C.A. N., Roder, H.M. Absolute determination of the thermal conductivity of argon at room temperature and pressures up tp 68 MPa. J. Res. Nat. Bur. Stand. (U.S.). 86(3): 293-307; 1981 May-June.
- [7] de Castro, C.A. N., Roder, H.M. The thermal conductivity of argon at 300.65 K. Evidence for a critical enhancement? Sengers, J.V., ed. Proceedings of the 8th Symposium on Thermophysical Properties; 1981 June 15-18, Gaithersburg, Maryland. ASME, New York; 1982. 241-246.

- [8] Roder, H.M. The thermal conductivity of oxygen. *J. Res. Nat. Bur. Stand. (U.S.)*. 87(4): 279-310, 1982 July-August.
- [9] Roder, H.M. Experimental thermal conductivity values for hydrogen, methane, ethane and propane. *Nat. Bur. Stand. (U.S.)*. NBSIR 84-3006; 1984 May. 64 p.
- [10] Roder, H.M. The thermal conductivity of hydrogen for temperatures between 78 and 310 K with pressures to 70 MPa. *Internat. J. Thermophys.* 5(4): 323-350; 1984 December.
- [11] Roder, H.M. The thermal conductivity of methane for temperatures between 110 and 310 K with pressures to 70 MPa. *Internat. J. Thermophys.* 6(2): 119-142; 1985 June.
- [12] Roder, H.M., Nieto de Castro, C.A. The thermal conductivity of ethane for temperatures between 110 and 325 K with pressures to 70 MPa. *High Temperatures-High Pressures*. 17: 453-460; 1985. 9 ETPC Proceedings page 447.
- [13] Roder, H.M., Friend, D.G. Experimental thermal conductivity values for mixtures of methane and ethane. *Nat. Bur. Stand. (U.S.)*. NBSIR 85-3024; 1985 March. 38 p.
- [14] Roder, H.M., Friend, D.G. The thermal conductivity of methane-ethane mixtures at temperatures between 140 and 330 K and at pressures to 70 MPa. *Internat. J. Thermophys.* 6(6): 607-617; 1985 November.
- [15] Roder, H.M., de Castro, C.A. N. The thermal conductivity of liquid propane. *J. Chem. Engr. Data* 27(1): 12-15; 1982 January.
- [16] Nieto de Castro, C.A., Taxis, B., Roder, H.M., Wakeham, W.A. Thermal diffusivity measurement by the transient hot-wire technique: A reappraisal. *Internat. J. Thermophys.* 9(3): 293-316; 1988 May.
- [17] Younglove, B.A. Thermophysical properties of fluids. I. Argon, ethylene, parahydrogen, nitrogen, nitrogen trifluoride, and oxygen. *J. Phys. Chem. Ref. Data* 11: Supplement No. 1; 1982.

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**BIBLIOGRAPHIC DATA  
SHEET** (See instructions)1. PUBLICATION OR  
REPORT NO.

NISTIR 88-3902

2. Performing Organ. Report No.

3. Publication Date

October 1988

## 4. TITLE AND SUBTITLE

EXPERIMENTAL THERMAL CONDUCTIVITY, THERMAL DIFFUSIVITY, AND SPECIFIC HEAT  
VALUES OF ARGON AND NITROGEN

## 5. AUTHOR(S)

R.M. Roder, R.A. Perkins, and C.A. Nieto de Castro

## 6. PERFORMING ORGANIZATION (If joint or other than NBS, see instructions)

National Institute of Standards and Technology  
**NATIONAL BUREAU OF STANDARDS**  
 DEPARTMENT OF COMMERCE  
 WASHINGTON, D.C. 20234

7. Contract/Grant No.

8. Type of Report &amp; Period Covered

## 9. SPONSORING ORGANIZATION NAME AND COMPLETE ADDRESS (Street, City, State, ZIP)

## 10. SUPPLEMENTARY NOTES

Document describes a computer program; SF-185, FIPS Software Summary, is attached.

## 11. ABSTRACT (A 200-word or less factual summary of most significant information. If document includes a significant bibliography or literature survey, mention it here)

We report new experimental measurements of thermal conductivity and thermal diffusivity as obtained in a transient hot-wire apparatus for argon and nitrogen. Values of the specific heat,  $C_p$ , are calculated from these measured values and the density associated with each measurement. The measurements were made at temperatures between 80 and 320 K with pressures between 0.1 and 70 MPa. The density range is 0 to 36 mol/L for argon and 0 to 32 mol/L for nitrogen. The total number of points recorded is 1484 for argon and 1423 for nitrogen.

## 12. KEY WORDS (Six to twelve entries; alphabetical order; capitalize only proper names; and separate key words by semicolons)

argon; hot wire; measurements; nitrogen; thermal conductivity; thermal diffusivity; specific heat; transient

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14. NO. OF  
PRINTED PAGES

56

15. Price





**IR 88-3903**

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