

HAYNES<sup>®</sup> 625 alloy

Creep and Rupture Properties

**HAYNES 625 Sheet, Solution Annealed**

Temperature		Creep	Approximate Initial Stress to Produce Specified Creep in					
			10 h		100 h		1,000 h	
°F	°C	%	ksi	MPa	ksi	MPa	ksi	MPa
1100	593	0.5	75	517	69	476	64	441
		1	76	524	71	490	67	462
		R	-	-	90	621	80	552
1200	649	0.5	53	365	52	359	50	345
		1	58	400	53	365	51	352
		R	84	579	74	510	55	379
1300	704	0.5	33	228	30	207	26	179
		1	36	248	31	214	27	186
		R	68*	469*	49	338	33	228
1400	760	0.5	18.4	127	13.0	90	9.7	67
		1	20	138	14.5	100	11.5	79
		R	41	283	27	186	17.8	123
1500	816	0.5	9.7	67	5.7	39	3.2	22
		1	11.3	78	7.0	48	4.2	29
		R	24	165	15.2	105	9.9	68
1600	871	0.5	5.2	36	2.6	18	1.2	8.3
		1	6.2	43	3.3	23	1.6	11
		R	14.0	97	8.0	55	4.2	29
1700	927	0.5	2.6	18	1.1	7.6	-	-
		1	3.4	23	1.7	12	-	-
		R	8.0*	55*	4.3	30	2.7	19
1800	982	0.5	1.2	8.3	-	-	-	-
		1	1.7	12	0.5	3.4	-	-
		R	4.1	28	2.6	18	1.4	10

\*Significant extrapolation

**Comparison of Stress to Produce 1% Creep in 1,000 Hours**

