

ST-L TORQUE MAKE-UP														
SIZE	WT/FT	GRADE	MAKE-UP TORQUE		SIZE	WT/FT	GRADE	MAKE-UP TORQUE						
			FT/LBS					FT/LBS						
			MIN.	MAX.				MIN.	MAX.					
2 3/8"	4.43	J-55	400	600	4"	11.34	L-80	1600	2000					
2 3/8"	4.43	L-80	500	700	4"	12.93	J-55	1450	1900					
2 3/8"	5.75	J-55	600	800	4"	12.93	L-80	1800	2400					
2 3/8"	5.75	L-80	800	1000	4 1/2"	9.40	J-55	900	1100					
2 7/8"	6.16	J-55	600	800	4 1/2"	9.40	L-80	1100	15000					
2 7/8"	6.16	L-80	800	1000	4 1/2"	10.23	J-55	950	1250					
2 7/8"	7.66	J-55	800	1000	4 1/2"	10.23	L-80	1200	1600					
2 7/8"	7.66	L-80	1000	1400	4 1/2"	10.79	J-55	1150	1450					
2 7/8"	8.44	J-55	1000	1200	4 1/2"	10.79	L-80	1400	1800					
2 7/8"	8.44	L-80	1100	1500	4 1/2"	11.35	J-55	1150	1450					
3 1/2"	8.81	J-55	1050	1350	4 1/2"	11.35	L-80	1500	1900					
3 1/2"	8.81	L-80	1400	1800	4 1/2"	12.24	J-55	1300	1700					
3 1/2"	9.91	J-55	1050	1350	4 1/2"	12.24	L-80	1700	2100					
3 1/2"	9.91	L-80	1500	1800	4 1/2"	13.04	J-55	1400	1800					
3 1/2"	12.52	J-55	1600	2000	4 1/2"	13.04	L-80	1800	2400					
3 1/2"	12.52	L-80	2000	2600	4 1/2"	14.98	J-55	1700	2100					
3 1/2"	15.37	J-55	2000	2600	4 1/2"	14.98	L-80	2200	2800					
3 1/2"	15.37	L-80	2500	3300	5"	12.83	J-55	1400	1600					
4"	9.11	J-55	1000	1200	5"	12.83	L-80	1800	2200					
4"	9.11	L-80	1200	1600	5"	14.87	J-55	1700	2100					
4"	10.46	J-55	1150	1450	5"	14.87	L-80	2100	2700					
4"	10.46	L-80	1400	1800	5"	17.93	J-55	2100	2700					
4"	11.34	J-55	1200	1600	5"	17.93	L-80	2700	3500					
SIZE	WT/FT	GRADE	MAKE-UP TORQUE		SIZE	WT/FT	GRADE	MAKE-UP TORQUE						
			FT/LBS					FT/LBS						
			MIN.	MAX.				MIN.	MAX.					
5"	20.01	J-55	2500	3300	5 1/2"	31.95	J-55	3500	4500					
5"	20.01	L-80	3200	4200	5 1/2"	31.95	L-80	4500	5700					
5"	20.63	J-55	2500	3300	6 5/8"	19.49	J-55	2100	2700					
5"	20.63	L-80	3200	4200	6 5/8"	19.49	L-80	2700	3500					
5"	23.08	J-55	3000	3800	6 5/8"	23.58	J-55	2700	3500					
5"	23.08	L-80	3800	4900	6 5/8"	23.58	L-80	3400	4400					
5"	24.03	J-55	2700	3500	6 5/8"	27.65	J-55	3500	4800					
5"	24.03	L-80	3400	4400	6 5/8"	27.65	L-80	4500	5900					
5 1/2"	13.70	J-55	1400	1800	6 5/8"	31.20	J-55	4100	5300					
5 1/2"	13.70	L-80	1800	2200	6 5/8"	31.20	L-80	5200	6600					
5 1/2"	15.35	J-55	1500	1900	7"	16.70	J-55	1700	2100					
5 1/2"	15.35	L-80	2200	2800	7"	16.70	L-80	2200	2800					
5 1/2"	16.87	J-55	1750	2250	7"	19.54	J-55	2100	2700					
5 1/2"	16.87	L-80	2400	3200	7"	19.54	L-80	2600	3400					
5 1/2"	19.81	J-55	1900	2500	7"	22.63	J-55	2500	3300					
5 1/2"	19.81	L-80	2900	3700	7"	22.63	L-80	3200	4200					
5 1/2"	22.54	J-55	2200	3000	7"	25.66	J-55	3300	4200					
5 1/2"	22.54	L-80	3700	4700	7"	25.66	L-80	4200	5400					
5 1/2"	25.54	J-55	3300	4300	7"	28.72	J-55	3700	4700					
5 1/2"	25.54	L-80	4200	5400	7"	28.72	L-80	4700	6100					
5 1/2"	28.13	J-55	3500	4800	7"	31.67	J-55	4100	5300					
5 1/2"	28.13	L-80	4000	5200	7"	31.67	L-80	5200	6800					
5 1/2"	29.64	J-55	3150	4050	7"	34.58	J-55	4500	5900					
5 1/2"	29.64	L-80	4200	5400	7"	34.58	L-80	5800	7400					
SIZE	WT/FT	GRADE	MAKE-UP TORQUE		SIZE	WT/FT	GRADE	MAKE-UP TORQUE						
			FT/LBS					FT/LBS						
			MIN.	MAX.				MIN.	MAX.					
7"	37.26	J-55	5000	6400	7 5/8"	50.91	J-55	5600	7600					
7"	37.26	L-80	6300	8100	7 5/8"	50.91	L-80	7500	9700					
7"	40.39	J-55	5400	7000	7 5/8"	52.57	J-55	6000	7800					
7"	40.39	L-80	6900	8900	7 5/8"	52.57	L-80	7700	9900					
7"	43.47	J-55	5400	7000	7 3/4"	45.47	J-55	6100	7900					
7"	43.47	L-80	6900	8900	7 3/4"	45.47	L-80	7800	10000					
7"	45.30	J-55	5700	7300	8 5/8"	23.57	J-55	2400	3200					
7"	45.30	L-80	7200	9200	8 5/8"	23.57	L-80	3100	4100					
7"	48.88	J-55	6500	8300	8 5/8"	27.02	J-55	3000	3800					
7"	48.88	L-80	8200	10600	8 5/8"	27.02	L-80	3800	4800					
7 5/8"	23.47	J-55	2600	3400	8 5/8"	31.10	J-55	3600	4600					
7 5/8"	23.47	L-80	3300	4300	8 5/8"	31.10	L-80	4500	5900					
7 5/8"	25.56	J-55	2900	3700	8 5/8"	35.14	J-55	4500	5700					
7 5/8"	25.56	L-80	3700	4800	8 5/8"	35.14	L-80	5700	7300					
7 5/8"	29.04	J-55	3700	4700	8 5/8"	39.29	J-55	5100	6500					
7 5/8"	29.04	L-80	4600	6000	8 5/8"	39.29	L-80	6500	8300					
7 5/8"	33.04	J-55	4300	5500	8 5/8"	43.39	J-55	4900	6300					
7 5/8"	33.04	L-80	5400	7000	8 5/8"	43.39	L-80	6200	8000					
7 5/8"	38.05	J-55	4900	6300	9 5/8"	38.94	J-55	4500	5700					

7 5/8"	38.05	L-80	6200	8000			9 5/8"	38.94	L-80	5700	7300
7 5/8"	44.67	J-55	6000	7800			9 5/8"	42.69	J-55	5600	7200
7 5/8"	44.67	L-80	7600	9800			9 5/8"	42.69	L-80	7100	9100
7 5/8"	46.73	J-55	6300	8100			9 5/8"	46.14	J-55	5300	8100
7 5/8"	46.73	L-80	8000	10300			9 5/8"	46.14	L-80	8000	10200
SIZE	WT/FT	GRADE	MAKE-UP TORQUE				SIZE	WT/FT	GRADE	MAKE-UP TORQUE	
			FT/LBS							FT/LBS	
			MIN.	MAX.						MIN.	MAX.
9 5/8"	52.85	J-55	7100	9100			11 3/4"	73.47	J-55	8500	10900
9 5/8"	52.85	L-80	8900	11500			11 3/4"	73.47	L-80	10700	13800
9 5/8"	57.38	J-55	7200	9200			11 7/8"	70.19	J-55	8100	10400
9 5/8"	57.38	L-80	9100	11700			11 7/8"	70.19	L-80	10100	13000
9 7/8"	61.74	J-55	8400	10800			13 3/8"	59.45	J-55	6900	8900
9 7/8"	61.74	L-80	10700	13800			13 3/8"	59.45	L-80	8700	11200
10 3/4"	38.88	J-55	4500	5700			13 3/8"	66.10	J-55	7600	9800
10 3/4"	38.88	L-80	5700	7300			13 3/8"	66.10	L-80	9700	12500
10 3/4"	44.22	J-55	5100	6500			13 3/8"	70.60	J-55	9500	12300
10 3/4"	44.22	L-80	6500	8300			13 3/8"	70.60	L-80	10900	13800
10 3/4"	49.50	J-55	6600	8400			13 3/8"	75.33	J-55	8800	11200
10 3/4"	49.50	L-80	8200	10600			13 3/8"	75.33	L-80	11000	14200
10 3/4"	54.21	J-55	6300	8100			13 3/8"	82.90	J-55	9600	12400
10 3/4"	54.21	L-80	8000	10200			13 3/8"	82.90	L-80	12200	15600
10 3/4"	59.40	J-55	6900	8900			13 5/8"	86.78	J-55	11900	15300
10 3/4"	59.40	L-80	8700	11200			13 5/8"	86.78	L-80	15100	19500
10 3/4"	64.53	J-55	7400	9600							
10 3/4"	64.53	L-80	9400	12100							
11 3/4"	58.81	J-55	6800	8800							
11 3/4"	58.81	L-80	8600	11000							
11 3/4"	63.97	J-55	7300	9300							
11 3/4"	63.97	L-80	9200	11800							
11 3/4"	69.42	J-55	8100	10350							
11 3/4"	69.42	L-80	10100	13000							







