

# DETAILING

## ACI Tension Lap Splice Lengths

Bar Size	Lap Class	$f'_c = 3,000$ psi				$f'_c = 4,000$ psi				$f'_c = 5,000$ psi			
		Top Bars		Other Bars		Top Bars		Other Bars		Top Bars		Other Bars	
		Case 1	Case 2	Case 1	Case 2	Case 1	Case 2	Case 1	Case 2	Case 1	Case 2	Case 1	Case 2
#3	A	22	32	17	25	19	28	15	22	17	25	13	19
	B	28	42	22	32	24	36	19	28	22	33	17	25
#4	A	29	43	22	33	25	37	19	29	22	33	17	26
	B	37	56	29	43	32	48	25	37	29	43	22	33
#5	A	36	54	28	41	31	47	24	36	28	42	22	32
	B	47	70	36	54	40	60	31	47	36	54	28	42
#6	A	43	64	33	50	37	56	29	43	33	50	26	38
	B	56	84	43	64	48	72	37	56	43	65	33	50
#7	A	63	94	48	72	54	81	42	63	49	73	37	56
	B	81	122	63	94	70	106	54	81	63	94	49	73
#8	A	72	107	55	82	62	93	48	71	55	83	43	64
	B	93	139	72	107	80	121	62	93	72	108	55	83
#9	A	81	121	62	93	70	105	54	81	63	94	48	72
	B	105	157	81	121	91	136	70	105	81	122	63	94
#10	A	91	136	70	105	79	118	61	91	70	105	54	81
	B	118	177	91	136	102	153	79	118	91	137	70	105
#11	A	101	151	78	116	87	131	67	101	78	117	60	90
	B	131	196	101	151	113	170	87	131	101	152	78	117
#14	N/A	121	181	93	139	105	157	81	121	94	140	72	108
#18	N/A	161	241	124	186	139	209	107	161	125	187	96	114

## ACI Tension Lap Splice Lengths

Bar Size	Lap Class	$f'_c = 6,000$ psi				$f'_c = 7,000$ psi				$f'_c = 8,000$ psi			
		Top Bars		Other Bars		Top Bars		Other Bars		Top Bars		Other Bars	
		Case 1	Case 2	Case 1	Case 2	Case 1	Case 2	Case 1	Case 2	Case 1	Case 2	Case 1	Case 2
#3	A	15	23	12	18	14	21	12	16	13	20	12	15
	B	20	30	16	23	18	28	16	21	17	26	16	20
#4	A	20	31	16	24	19	28	15	22	18	26	14	20
	B	26	40	20	31	25	37	19	28	23	34	18	26
#5	A	25	38	20	29	24	35	18	27	22	33	17	25
	B	33	49	25	38	31	46	24	35	29	43	22	33
#6	A	31	46	24	35	28	42	22	33	26	40	20	30
	B	40	59	31	46	37	55	28	42	34	51	26	40
#7	A	44	66	34	51	41	61	32	47	38	58	30	44
	B	58	86	44	66	53	80	41	61	50	75	38	58
#8	A	51	76	39	58	47	70	36	54	44	66	34	51
	B	66	98	51	76	61	91	47	70	57	85	44	66
#9	A	57	85	44	66	53	79	41	61	49	74	38	57
	B	74	111	57	85	69	103	53	79	64	96	49	74
#10	A	64	96	49	74	59	89	46	69	56	83	43	64
	B	83	125	64	96	77	116	59	89	72	108	56	83
#11	A	71	107	55	82	66	99	51	76	62	93	48	71
	B	93	139	71	107	86	128	66	99	80	120	62	93
#14	N/A	86	128	66	99	79	119	61	91	74	111	57	85
#18	N/A	114	171	88	131	106	158	81	122	99	148	76	114

### NOTES

1. Tabulated values are based on Grade 60 reinforcing bars and normal weight concrete.