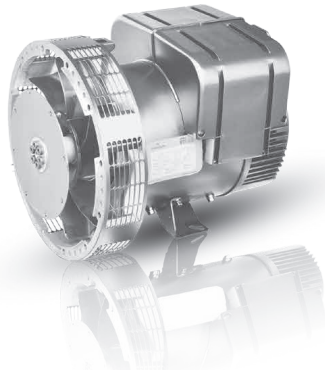


TAL A42

29– 75.6 kVA



Leroy-Somer is a leading global supplier of alternators for emergency power. Our new TAL low voltage alternators, with optimal performance for commercial and industrial applications, are a simple, efficient solution for your onsite power requirements.

Leroy-Somer's TAL alternators are specially designed to meet the power needs of telecom towers and commercial and industrial buildings. TAL is compatible with most engine brands.

Common Data

Insulation Class	H	Excitation System	SHUNT
Winding Pitch	2/3 (Winding 6S)	A.V.R. Model	R120
Leads	6	Voltage Regulation (*)	± 1 %
Drip Proof	IP 23	Total Harmonic THD (**) in no-load	< 3.5 % according to C.E.I.
Altitude	≤ 1000 m	Total Harmonic THD (**) in linear load:	< 5 % according to C.E.I.
Overspeed	2250 R.P.M.	Waveform NEMA = TIF (**)	< 50
(*) Steady state duty. (**) Total harmonic content line to line, at no loads of full rated linear and balanced loads.		Waveform I.E.C. = THF (**)	< 2%

Ratings (50 Hz – 1500 r.p.m and 60 Hz – 1800 r.p.m.)

kVA / kW - P.F. = 0.8																	
TAL A42	50 Hz - 1500 R.P.M.								60 Hz - 1800 R.P.M.								
Duty/T°C	Continuous / 40°C				St. By/ 27°C				Reactance	Continuous / 40°C				St. By/ 27°C			
Class/T°K	H / 125°K				H / 163°K					H / 125°K				H / 163°K			
	Rating kVA				Rating kVA					Rating kVA				Rating kVA			
Phase	3 ph.				3 ph.					3 ph.				3 ph.			
Y	380V	400V	415V	380V	400V	415V	380V	400V		415V	380V	416V	440V	480V	380V	416V	440V
Δ	220V	230V	240V	220V	230V	240V	x'd	x'd	220V	240V	254V	277V	220V	240V	254V	277V	
TAL-A42-C	29	30	30	31	33	33	16.7	9	28	31	32.5	36	31	34	36	39.5	
TAL-A42-E	36	38	38	40	42	42	15	8.1	36	39.5	41.4	45.5	39.5	43.5	45.5	50	
TAL-A42-F	43	45	45	48	50	50	14.1	7.6	43	46.5	49	54	47	51	54	59	
TAL-A42-G	48	50	50	52	55	55	14.9	8	47	52	54.5	60	52	57	60	66	
TAL-A42-H	60	63	63	67	70	70	15.2	8.2	60	65.5	68.5	75.6	66	72	75.5	83	

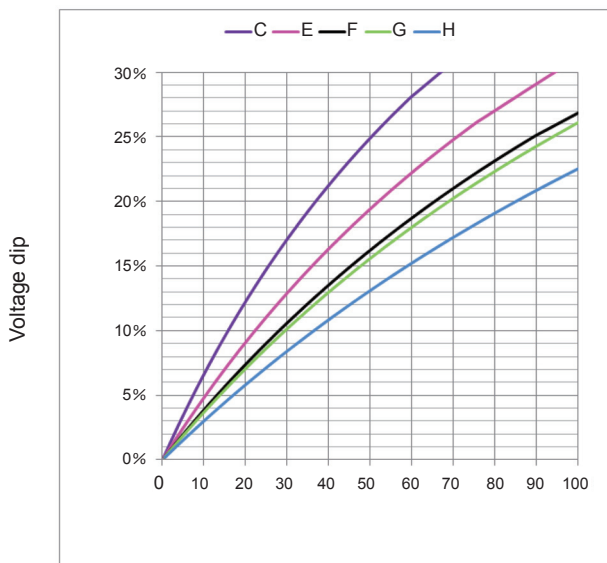
Efficiencies (%)

Class H / 40 ° C

	Three Phase: 400 V - 50 Hz										Three Phase: 480 V - 60 Hz										
	P.F. = 0.8					P.F. = 1					P.F. = 0.8					P.F. = 1					
	1/4	2/4	3/4	4/4	St.By	1/4	2/4	3/4	4/4	St.By	1/4	2/4	3/4	4/4	St.By	1/4	2/4	3/4	4/4	St.By	
TAL-A42-C	82.5	86.1	86.8	85.5	84.1	83.9	87.9	90.0	89.8	89.3	TAL-A42-C	83.2	87.1	87.7	86.0	84.6	84.9	89.4	90.6	90.4	89.7
TAL-A42-E	84.4	87.6	88.2	86.5	85.3	85.8	89.1	91.2	90.7	90.3	TAL-A42-E	85.1	88.5	89.3	88.1	86.7	86.7	90.5	91.7	91.7	91.0
TAL-A42-F	85.5	88.6	89.3	88.0	86.2	87.3	90.5	92.5	92.5	91.2	TAL-A42-F	87.5	91.6	92.3	91.0	89.6	88.6	92.6	94.7	94.5	94.0
TAL-A42-G	85.6	88.6	89.3	88.1	86.9	87.6	90.6	92.7	92.6	91.7	TAL-A42-G	87.2	91.5	92.8	91.4	89.2	89.1	92.9	94.9	94.7	94.4
TAL-A42-H	86.3	89.1	89.6	88.6	87.4	88.4	91.1	93.0	93.1	91.8	TAL-A42-H	86.9	90.4	91.2	89.8	88.2	88.8	92.6	93.5	93.5	93.0

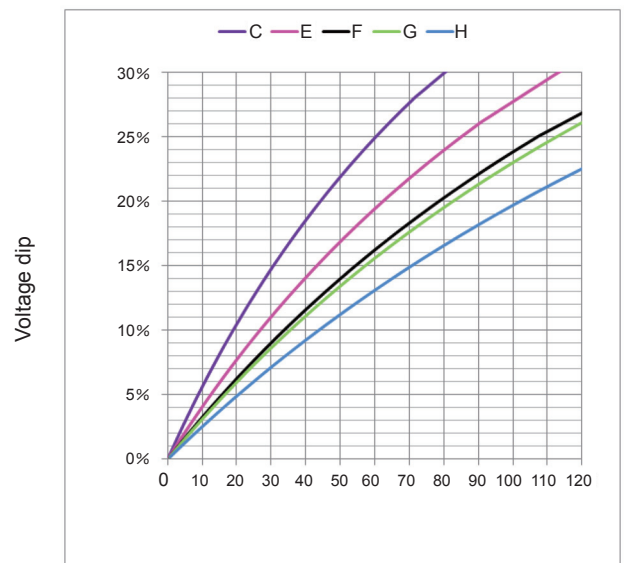
Transient Voltage Variation – Motor Starting

400V - 50 Hz



KVA at P.F=0.6

480V - 60 Hz



KVA at P.F=0.6

Locked Rotor – kVA at 0.6 Power Factor