

Project checklist – Part 1

Customer							
Author							
Project				Telephone			
Factory ref. no.				Fax			
Delivery date				Date			
Standards and prescriptions							
<input checked="" type="checkbox"/> IEC 61439-1/2 / EN 61439-1/2 VDE 0660 Part 600-1/2		IEC/TR 61641, arc resistance <input type="checkbox"/> Level 1, personal safety <input type="checkbox"/> Level 3, limitation to functional compartment <input type="checkbox"/> Insulated main busbar <input type="checkbox"/> Arc barrier					
		<input type="checkbox"/> Level 2, limitation to one cubicle <input type="checkbox"/> Level 4, limitation to the place of origin <input type="checkbox"/> Arc detection system					
Environmental conditions							
Operating conditions		<input type="checkbox"/> Standard (interior climate 3K4)		<input type="checkbox"/> Special		<input type="checkbox"/> Corrosive gases (e.g. H ₂ S)	
Ambient air temperature (24-h mean)		<input type="checkbox"/> 20 °C	<input type="checkbox"/> 25 °C	<input type="checkbox"/> 30 °C	<input type="checkbox"/> 35 °C	<input type="checkbox"/> 40 °C	<input type="checkbox"/> 45 °C
Site altitude above sea level		<input type="checkbox"/> ≤ 2,000 m		<input type="checkbox"/> Others: _____ m			
Adverse operating conditions		<input type="checkbox"/> None		<input type="checkbox"/> Earthquake-proof		<input type="checkbox"/> Ship/Offshore	
		<input type="checkbox"/> Others: _____					
Layout and installation							
Type of installation		<input type="checkbox"/> Single-fronted		<input type="checkbox"/> Back-to-back		<input type="checkbox"/> Double-fronted	
Connection inside the cubicle		<input type="checkbox"/> Front		<input type="checkbox"/> Rear			
Restriction of total length		<input type="checkbox"/> Without		<input type="checkbox"/> Yes		mm	
Max. net length per transport unit		<input type="checkbox"/> 2,400 mm		<input type="checkbox"/> Others		mm	
Cable/busbar entry							
Incoming feeder cubicles		<input type="checkbox"/> From bottom		<input type="checkbox"/> From top			
Outgoing feeder cubicles		<input type="checkbox"/> From bottom		<input type="checkbox"/> From top			
Degree of protection							
Ventilated cubicle		<input type="checkbox"/> IP30	<input type="checkbox"/> IP31	<input type="checkbox"/> IP40	<input type="checkbox"/> IP41	<input type="checkbox"/> IP43	
Non-ventilated cubicle							<input type="checkbox"/> IP54
Towards the cable floor		<input type="checkbox"/> IP00	<input type="checkbox"/> IP30	<input type="checkbox"/> IP40	<input type="checkbox"/> IP54		
		<input type="checkbox"/> At the factory		<input type="checkbox"/> At the building site			

Project checklist – Part 2

Project								
Network data / infeed data								
Grid type	<input type="checkbox"/> TN-C	<input type="checkbox"/> TN-S	<input type="checkbox"/> TN-C-S	<input type="checkbox"/> IT	<input type="checkbox"/> TT			
Transformer rated power S_r			kVA	Rated impedance voltage U_z				%
Rated operational voltage U_e			V	Frequency f				Hz
Rated short-time withstand current I_{cw}			kA	Short-circuit withstand current I_k at DC				kA
Design of external connection	<input type="checkbox"/> L1, L2, L3, PEN		<input type="checkbox"/> L1, L2, L3, PE + N <input type="checkbox"/> ZEP (PEN + PE)		<input type="checkbox"/> Others:			
	<input type="checkbox"/> 3-pole switchable		<input type="checkbox"/> 4-pole switchable					
Horizontal busbar system								
Position	<input type="checkbox"/> Top		<input type="checkbox"/> Rear (top)		<input type="checkbox"/> Rear (bottom)			
Rated current I_n			A		A		A	
CU treatment	<input type="checkbox"/> Bright		<input type="checkbox"/> Silver-plated		<input type="checkbox"/> Tin-plated			
Design L1, L2, L3 + ...	<input type="checkbox"/> PEN	<input type="checkbox"/> PE	<input type="checkbox"/> N	<input type="checkbox"/> PEN, N = 50 %		<input type="checkbox"/> PEN, N = 100 %		
	<input type="checkbox"/> Others:							
Vertical busbar system / Distribution busbars								
CU treatment	<input type="checkbox"/> Bright	<input type="checkbox"/> Silver-plated	<input type="checkbox"/> Tin-plated					
Design L1, L2, L3 + ...	<input type="checkbox"/> PEN	<input type="checkbox"/> PE	<input type="checkbox"/> N	<input type="checkbox"/> PEN, N = 50 %		<input type="checkbox"/> PEN, N = 100 %		
Internal separation								
Circuit-breaker design	<input type="checkbox"/> Form 1	<input type="checkbox"/> Form 2b	<input type="checkbox"/> Form 3a			<input type="checkbox"/> Form 4b	<input type="checkbox"/> Form 4 type 7	
Universal mounting design				<input type="checkbox"/> Form 3b	<input type="checkbox"/> Form 4a	<input type="checkbox"/> Form 4b	<input type="checkbox"/> Form 4 type 7	
Fixed-mounted design	<input type="checkbox"/> Form 1	<input type="checkbox"/> Form 2b		<input type="checkbox"/> Form 3b	<input type="checkbox"/> Form 4a	<input type="checkbox"/> Form 4b		
In-line design, plug-in				<input type="checkbox"/> Form 3b		<input type="checkbox"/> Form 4b		
In-line design, fixed-mounted	<input type="checkbox"/> Form 1	<input type="checkbox"/> Form 2b						
Reactive power compensation	<input type="checkbox"/> Form 1	<input type="checkbox"/> Form 2b						
Notes								