

<u>Task (Assumes equipment is energized, and work is done within the flash protection boundary)</u>	<u>Hazard/Risk Category</u>	<u>V-Rated Gloves</u>	<u>V-Rated Tools</u>
Panelboards rated 240V and below - Notes 1 and 3	-	-	-
CB or fused switch operation with covers on	0	N	N
CB or fused switch operation with covers off	0	N	N
Work on energized parts, including voltage testing	1	Y	Y
Remove/Install CB's or fused switches	1	Y	Y
Removal of bolted covers (To expose bare, energized parts)	1	N	N
Opening of hinged covers (To expose bare, energized parts)	0	N	N
Panelboards or Switchboards rated >240V and up to 600V (With molded case or insulated case CB's) Notes 1 and 3	-	-	-
CB or fused switch operation with covers on	0	N	N
CB or fused switch operation with covers off	1	N	N
Work on energized parts, including voltage testing	2*	Y	Y
600V class MCC's - Notes 2 and 3	-	-	-
CB or fused switch or starter operation with enclosure doors closed	0	N	N
Reading a panel meter while operating a meter switch	0	N	N
CB or fused switch or starter operation with enclosure doors open	1	N	N
Work on energized parts, including voltage testing	2*	Y	Y
Work on control circuits with exposed energized parts 120V or below	0	Y	Y
Work on control circuits with exposed energized parts >120V	2*	Y	Y
Insertion/Removal of individual starter "buckets" - Note 4	3	Y	N
Application of safety grounds, after voltage test	2*	Y	N
Removal of bolted covers (To expose bare, energized parts)	2*	N	N
Opening of hinged covers (To expose bare, energized parts)	1	N	N
600V class switchgear (With power circuit breakers or fused switches) Notes 5 and 6	-	-	-
CB or fused switch operation with enclosure doors closed	0	N	N
Reading a panel meter while operating a meter switch	0	N	N
CB or fused switch or starter operation with enclosure doors open	1	N	N
Work on energized parts, including voltage testing	2*	Y	Y
Work on control circuits with exposed energized parts 120V or below	0	Y	Y
Work on control circuits with exposed energized parts >120V	2*	Y	Y
Insertion or removal (Racking) of CB's from cubicles (Doors open)	3	N	N
Insertion or removal (Racking) of CB's from cubicles (Doors closed)	2	N	N
Application of safety grounds, after voltage test	2*	Y	N
Removal of bolted covers (To expose bare, energized parts)	3	N	N
Opening of hinged covers (To expose bare, energized parts)	2	N	N
Other 600V Class (277V-600V) equipment - Note 3	-	-	-
Lighting or small power transformers	-	-	-
Removal of bolted covers (To expose bare, energized parts)	2*	N	N
Opening of hinged covers (To expose bare, energized parts)	1	N	N
Work on energized parts, including voltage testing	2*	Y	Y
Application of safety grounds, after voltage test	2*	Y	N

Revenue meters (kWh)	-	-	-
Insertion or removal	2*	Y	N
Cable trough or tray cover removal or installation	1	N	N
Misc. equipment removal or insertion	1	N	N
Work on energized parts, including voltage testing	2*	Y	Y
Application of safety grounds, after voltage test	2*	Y	N

NEMA E2 (fused contactor) Motor starters 2.3Kv - 7.2Kv

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Contactor operation with enclosure doors closed	0	N	N
Reading a panel meter while operating a meter switch	0	N	N
Contactor operation with enclosure doors open	2*	N	N
Work on energized parts, including voltage testing	3	Y	Y
Work on control circuits with exposed energized parts 120V or below	0	Y	Y
Work on control circuits with exposed energized parts >120V	3	Y	Y
Insertion or removal (racking) or starters from cubicles (Doors open)	3	N	N
Insertion or removal (racking) or starters from cubicles (Doors closed)	2	N	N
Application of safety grounds, after voltage test	3	Y	N
Removal of bolted covers (To expose bare, energized parts)	4	N	N
Opening of hinged covers (To expose bare, energized parts)	3	N	N

Metal Clad Switchgear 1Kv and above

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CB or fused switch operation with enclosure doors closed	2	N	N
Reading a panel meter while operating a meter switch	0	N	N
CB or fused switch or starter operation with enclosure doors open	4	N	N
Work on energized parts, including voltage testing	4	Y	Y
Work on control circuits with exposed energized parts 120V or below	2	Y	Y
Work on control circuits with exposed energized parts >120V	4	Y	Y
Insertion or removal (Racking) of CB's from cubicles (Doors open)	4	N	N
Insertion or removal (Racking) of CB's from cubicles (Doors closed)	2	N	N
Application of safety grounds, after voltage test	4	Y	N
Removal of bolted covers (To expose bare, energized parts)	4	N	N
Opening of hinged covers (To expose bare, energized parts)	3	N	N
Opening voltage transformer or CPT compartments	4	N	N
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Other Equipment 1Kv and above

Metal clad load interrupter switches, fuses or unfused

	-	-	-
Switch operation, doors closed	2	N	N
Work on energized parts, including voltage testing	4	Y	Y
Removal of bolted covers (To expose bare, energized parts)	4	N	N
Opening of hinged covers (To expose bare, energized parts)	3	N	N
Outdoor switch operation (hookstick operated)	3	Y	Y
Outdoor switch operation (gang operated, from grade)	2	N	N
Insulated cable examination, in manhole or other confined space	4	Y	N
Insulated cable examination, in open area	2	Y	N

Legend

V-Rated Gloves - gloves rated and tested for the maximum line to line voltage which the work will be done

V-Rated Tools - tools rated and tested for the maximum line to line voltage which the work will be done

2* means that a double layered switching hood are required for this task in addition to other hazard/risk

category 2 requirements

Y=Yes (required)

N=No (not required)

Notes:

1. 25 kA short circuit current available, 0.03 second (2 cycle) fault clearing time.
2. 65 kA short circuit current available, 0.03 second (2 cycle) fault clearing time.
3. For < 10KA short circuit current available, the hazard/risk category may be reduced by one number.
4. 65 kA short circuit current available, 0.33 second (20 cycle) fault clearing time.
5. 65 kA short circuit current available, up to 1.0 second (60 cycle) fault clearing time.
6. For < 25KA short circuit current available, the hazard/risk category may be reduced by one number.