Ensure Correct breaker settings

Does this solve the problem?

1] Yes

2] No

3] I don't know

- **Explanation**
  Check setting of circuit breaker in Control Panel +AT2:
  Evo II, 50 Hz (breaker F13): 20 Amp
  Evo II, 60 Hz (breaker F18): 36 Amp

Identify and repair loose connections at Motor junction box

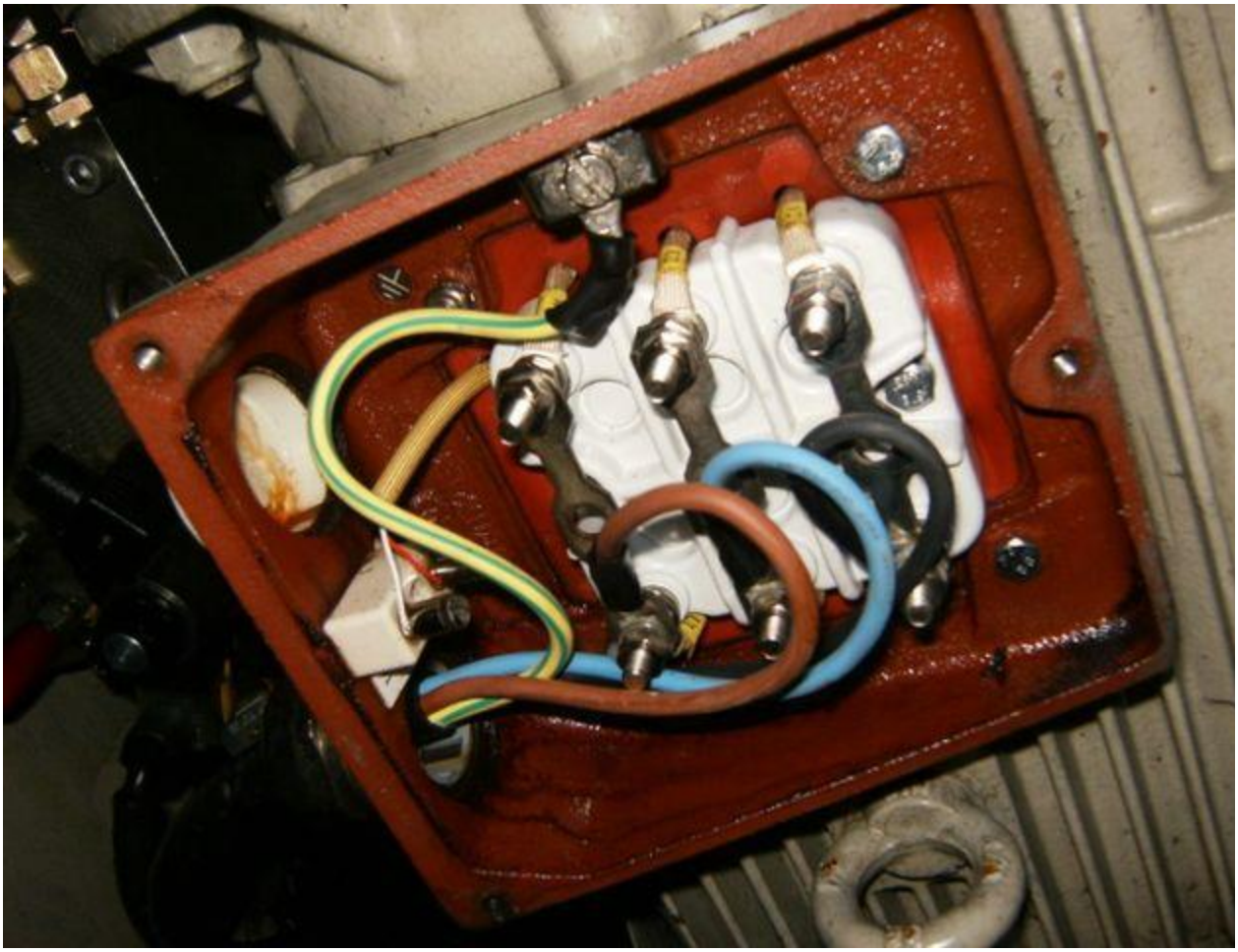
Does this solve the problem?

1] Yes

2] No

3] I don't know

- **Explanation**
  Check for loose connections or contamination in motor junction box.



Identify and repair circuit faults

Does this solve the problem?

1] Yes

2] No

3] I don't know

- **Explanation**

  Check resistance leg to leg both before and after the T04. To check after the T04, it is necessary to remove the motor from the circuit, either by opening the QN01 switch, or removing the bridge jumpers from the termination box on the motor itself. Remember to close the QN01 switch before leaving the nacelle; you will get a Pitch Soft Starter fault if you do not.

Test fuses-identify root cause of failure-replace fuses

Does this solve the problem?

1] Yes

2] No

3] I don't know

- **Explanation**

Check the condition of the F17 fuses underneath the plastic enclosure. While checking, pull off and reseat the feedback devices for the fuses, as well. Use a multimeter to check continuity from the feedback devices to the 530 input on the TOI. The input runs through all feedbacks in series as well as the F18, you can isolate any break in the circuit in this way.

Identify the condition of the Motor windings

Does this solve the problem?

1] Yes

2] No

3] I don't know

- **Explanation**

Check continuity to ground on each leg. A short to ground could indicate a wiring fault, or a bad motor. This can be done by use of a Megger.

Upgrade to new soft starter type

Does this solve the problem?

1] Yes

2] No

3] I don't know

- **Explanation**

Check ramp settings of T04 soft starter and measure inrush current with amp clamp, if inrush is above 125 amps then soft starter is likely defective.

CIM Case 2322 is created to deal with this soft starter issue.
Replacement instruction has been developed 0028-6642 Replacement of Softstarter

Upgrade kit 883296 SOFTSTARTER (includes new softstarter)

60120546 - Softstarter PSE 45 500V AC (if already upgrade to new type).

Relevant CIM case		
CIM case	**Task list**	**SWI**
2322	16888	0028-6642
	16895	

Relevant spare parts	
Description	**Item No.**
SOFTSTARTER UPGRADEKIT CIM2322	883296
SOFT STARTER PSE-45 500V AC	60120546

Check and Replace the Circuit breaker

Does this solve the problem?

1] Yes

2] No

3] I don't know

- **Explanation**

All three phases (L1-L2-L3) contacts to be checked for proper closing

Relevant spare parts	
Description	**Item No.**

CB 3RV1131-4DA10 18.0-25.0A (for 50Hz)	60004762

Clean/repair slipring

Does this solve the problem?

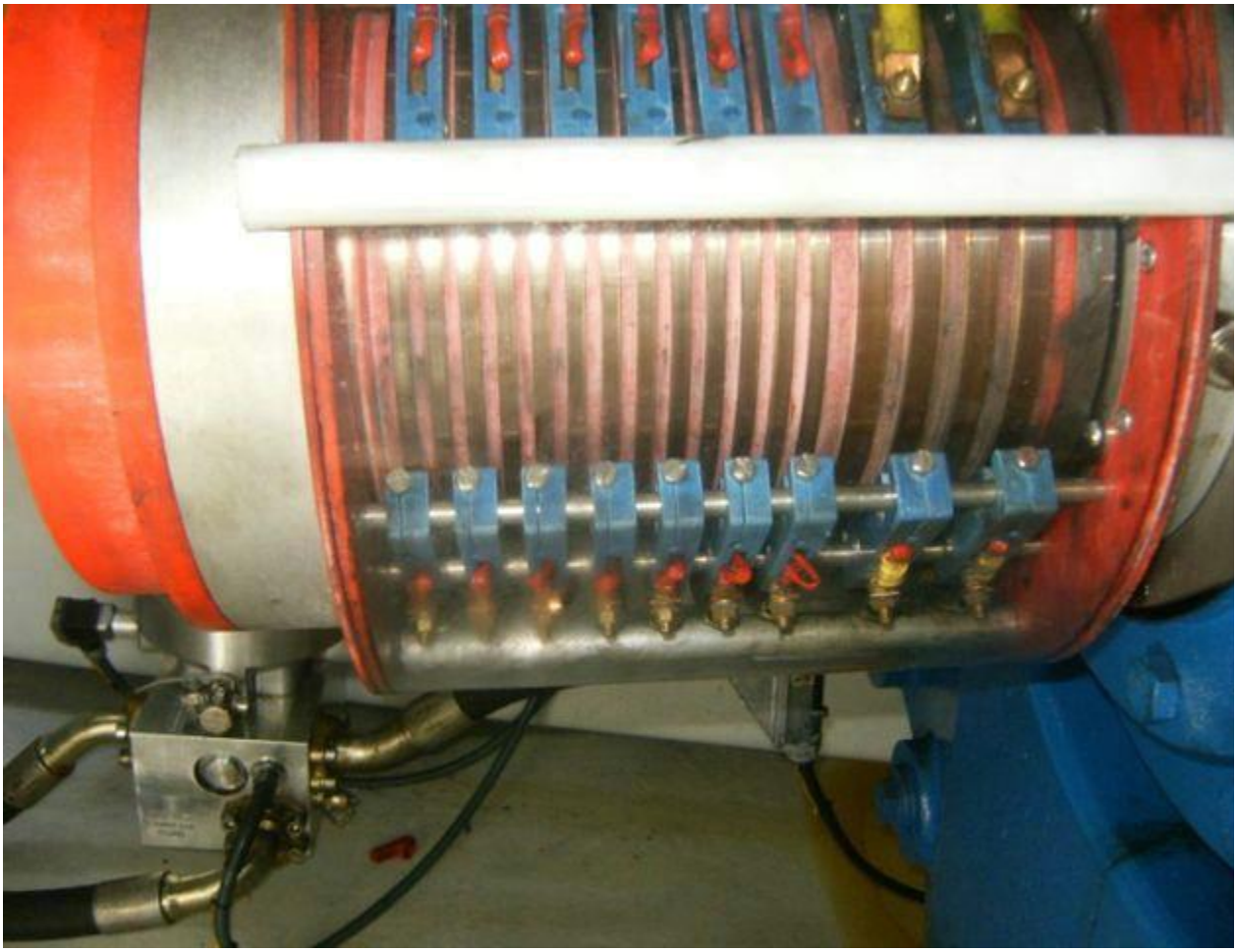
1] Yes

2] No

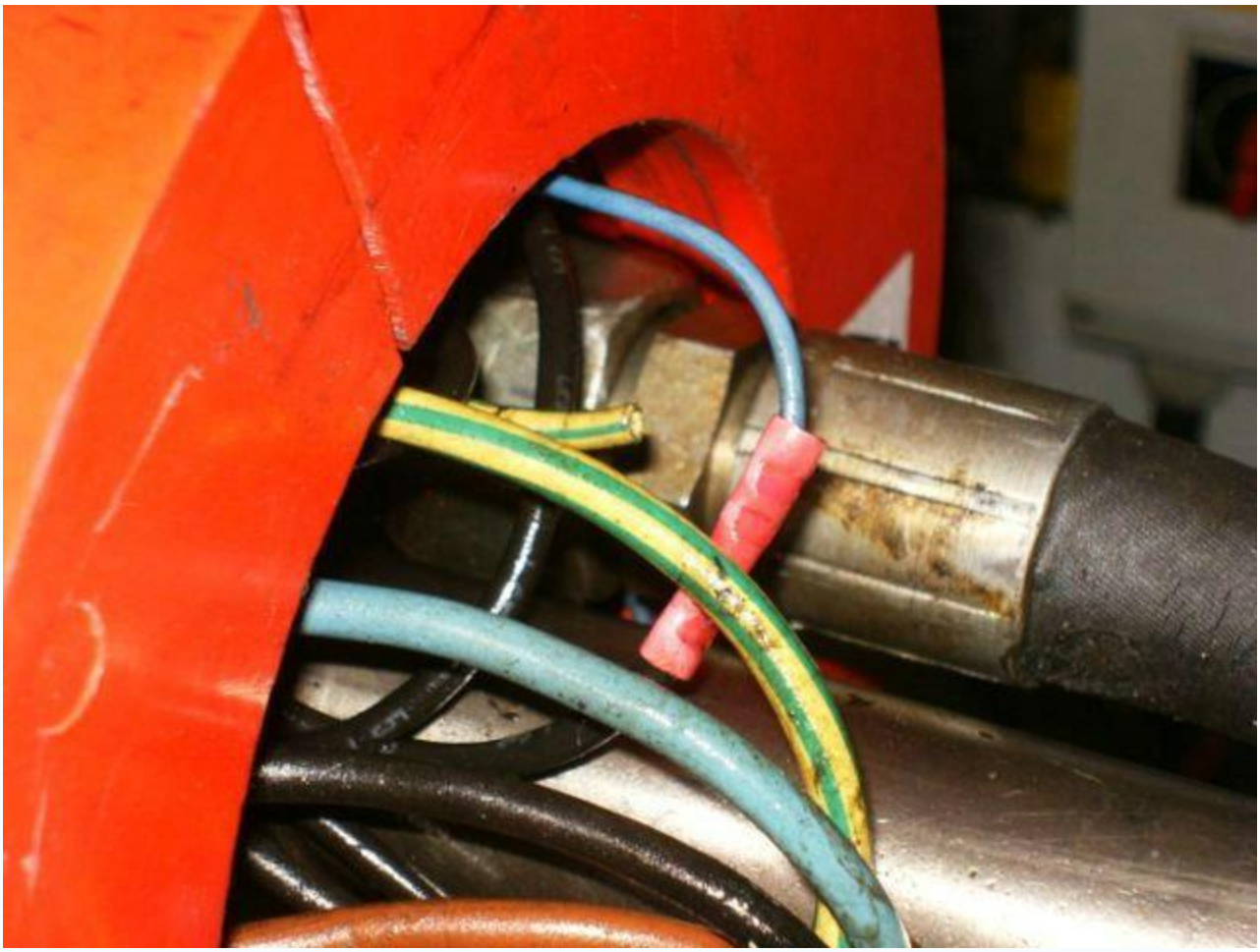
3] I don't know

- **Explanation**

Check condition of slip ring, paying special attention to condition of brushes. If the brushes are found damaged, then change the brushes.



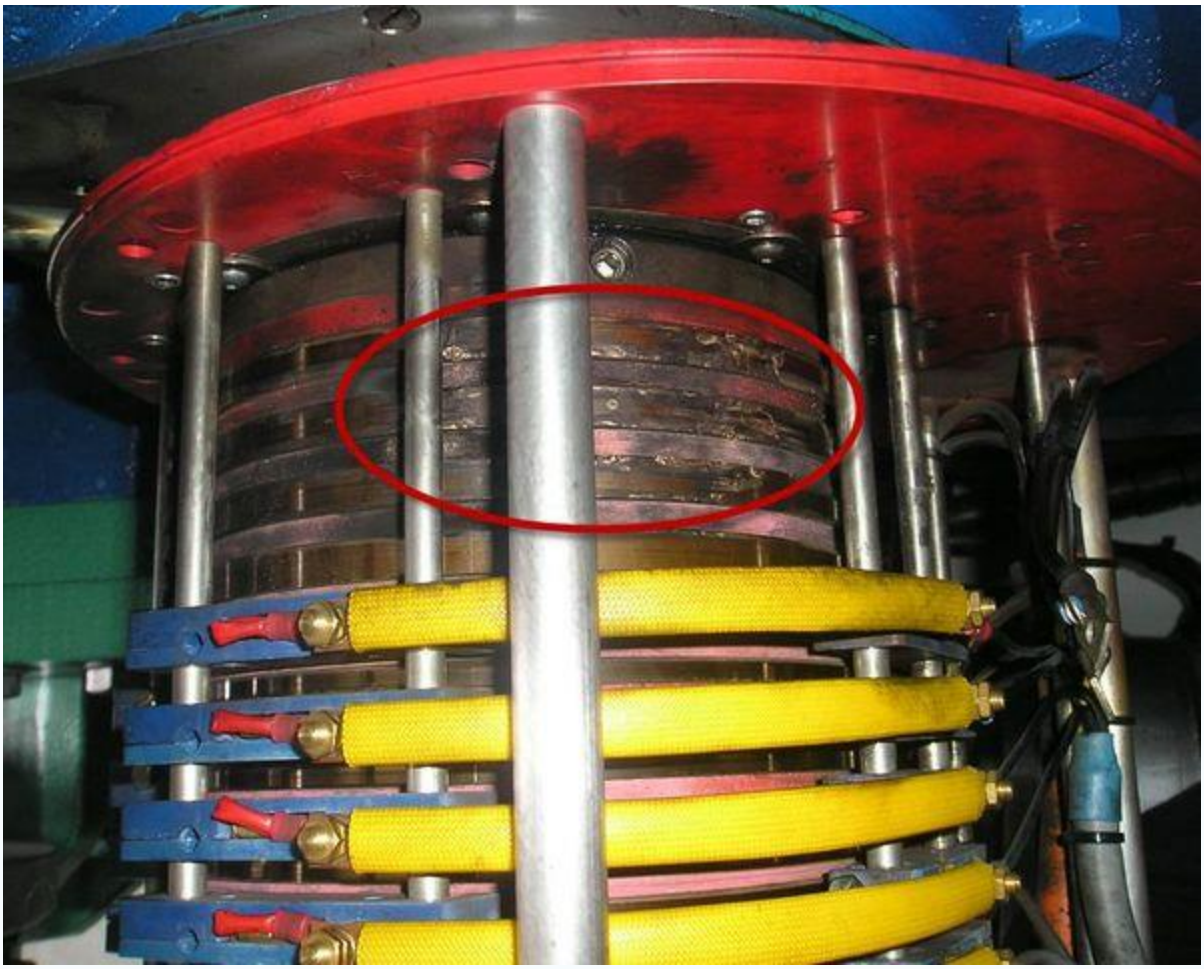
Check set screws on slip ring and if cables have been pulled tight around feeder pipes inside the slip ring.

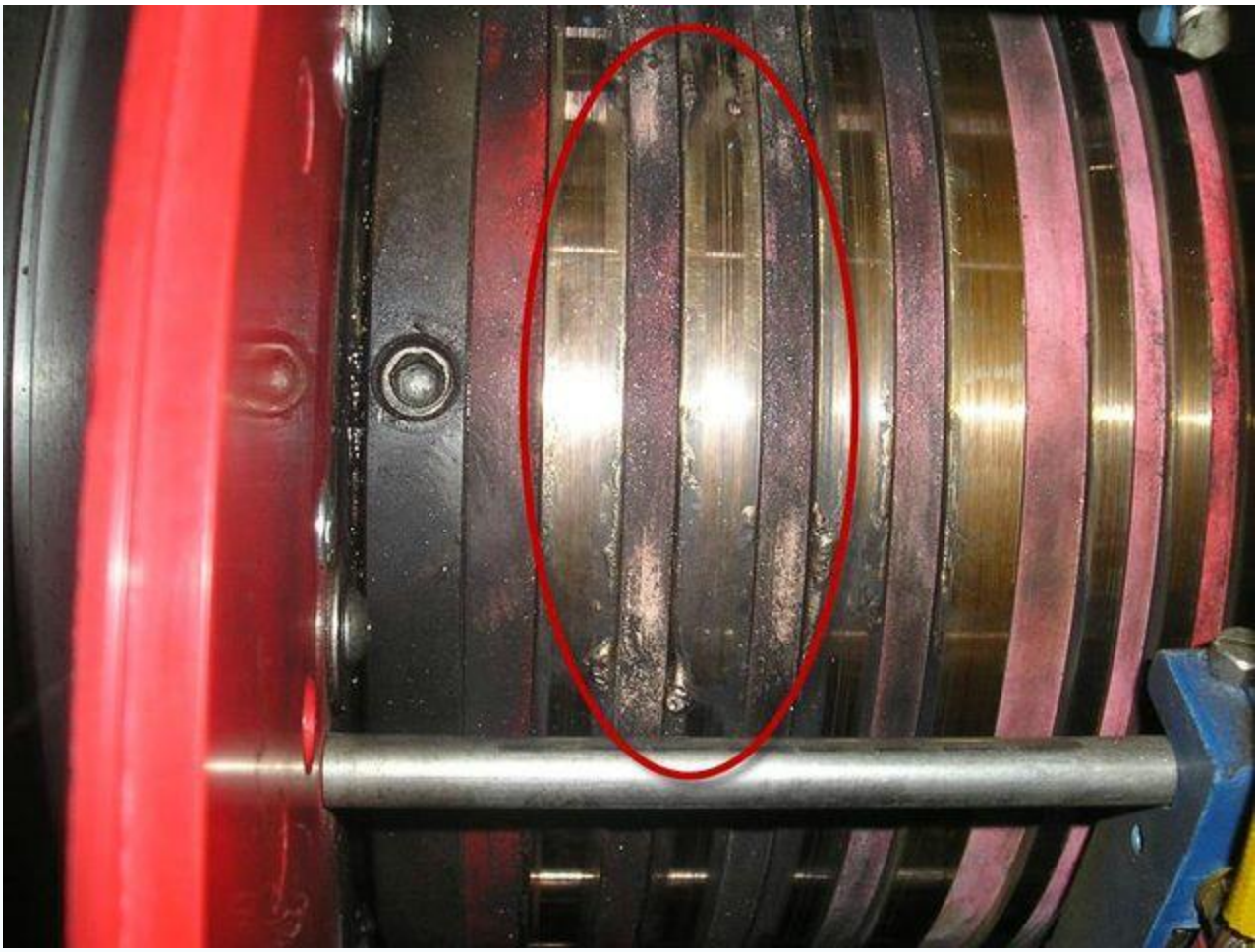


Use document 0001-4933 Cleaning Procedure for Slipring Unit, V82-1.65 MW

Relevant documentation	
Description	**DMS No.**
Cleaning Procedure for Slipring Unit, V82	0001-4933

Check the damages on slip ring tracks, irreversible (Severe) damage, and Entire slip ring to be replaced.





Relevant documentation		
Description	**DMS No.**	**Task list**
Replacement of slip ring	0022-0967	18361

Relevant spare parts

Description	Item No.
SLIP RING GB 17 WAYS REV B	60093429
20A BRUSH HOLDER ASSEMB. COPPE	60069223