



Energizing People > Powering the Future



Complementary training module - 1 day

MV7315 Drive

Applications: MV7310/7315/7604 PTI-PTO

Learning objective and performance outcome:

Upon completion of this course, the participants will be able to:

- Understand the high voltage safety requirements;
- Understand the drive system architecture, identify each drive component together with the configuration setting;
- Perform advanced troubleshooting tasks;
- Locate and replace each faulty drive components by practical operating exercises;
- Perform quickly and safely the power drive restarting and retrieve vessel capability.

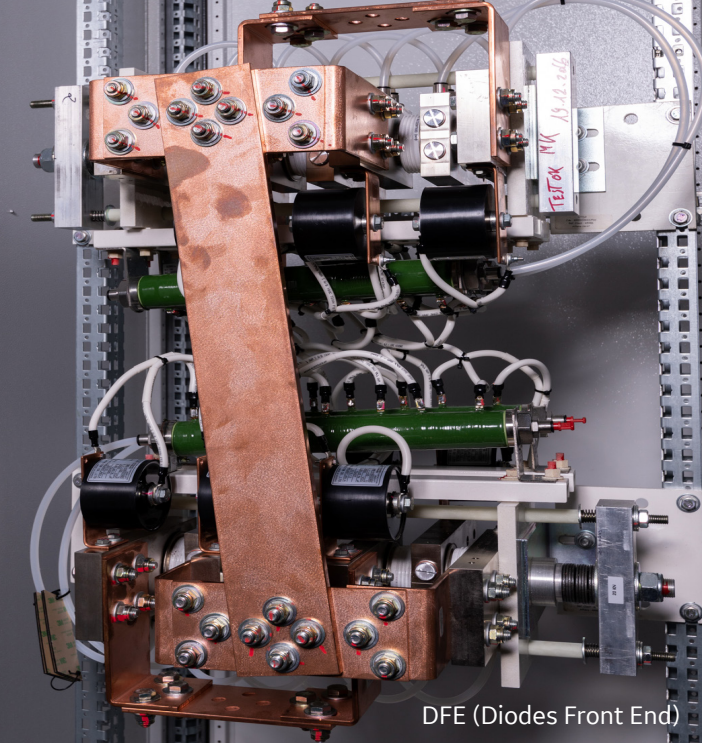
Course content:

Understand the function of the power electronic components:

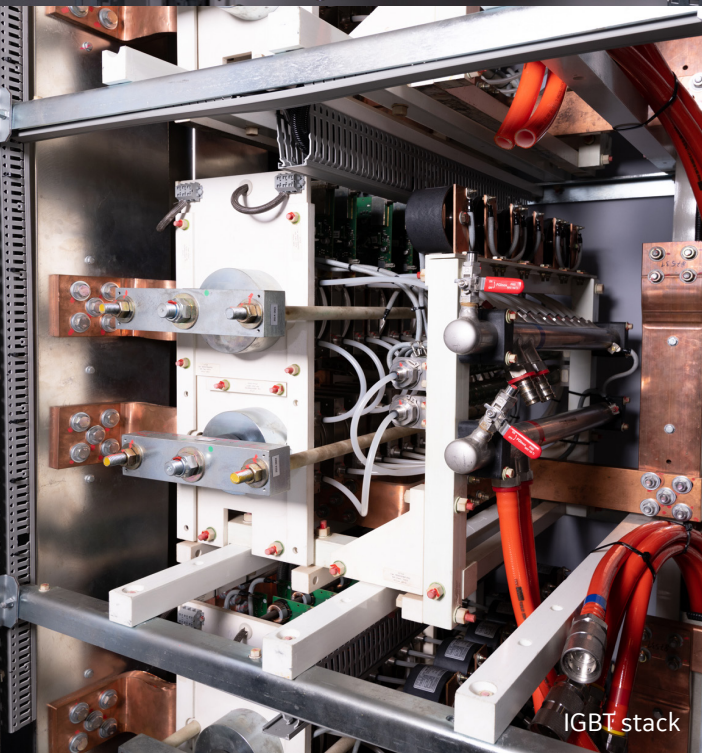
- DFE (Diodes Front End);
- DC Bus capacitors;
- IGBTs and RC snubber;
- PIB651/671 cards & power supplies (gate drivers & troubleshooting LEDs);
- Analogy between drawing and equipment.

Carry out the main measurements and replacement on the power electronic components:

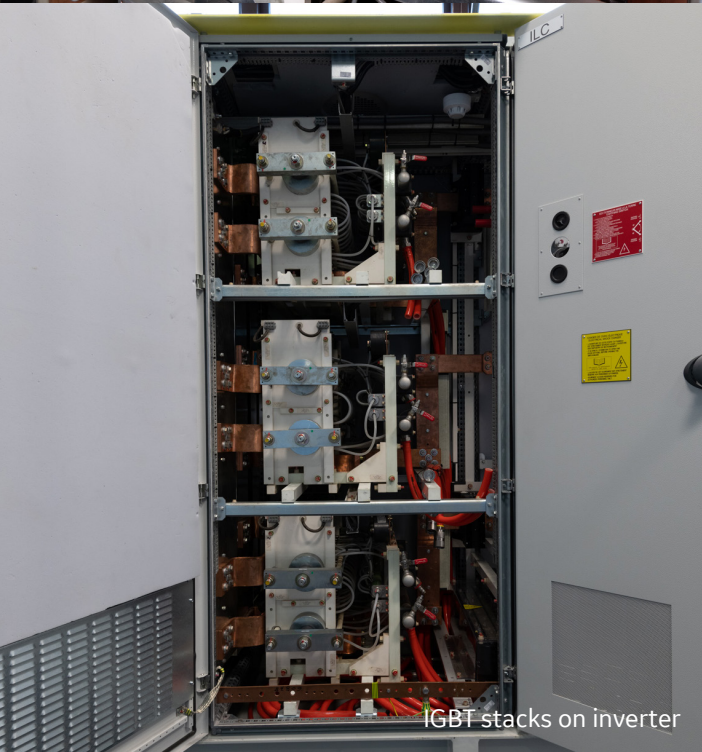
- DFE/DC Bus capacitors/RC snubbers;
- IGBTs replacement (dismantling & reassembly procedure by the trainees with guidance);
- PIB651/671 cards & power supplies (gate drivers & IGBT pulse tests);
- Optical fiber: Measure loss & power levels, inspect & clean connector end faces.



DFE (Diodes Front End)



IGBT stack



IGBT stacks on inverter

CREW TRAINING

Crew training is essential for:

- Optimizing the performance of your teams;
- Reducing propulsion downtime;
- Increasing safety operation;
- Making the dialog with our remote support experts efficient.

Therefore, we have developed the practically oriented training options for our power drives used in marine, where the participants will **learn how to operate, maintain and troubleshoot the system** with the best instruction method: practical exercises using the right tools.

25+ YEARS OF EXPERTISE

In our certified training centers, we propose general or specific training courses

These training sessions allow trainees to acquire or refresh their knowledge of electric propulsion, on hardware or software used on vessels fitted with GE Power Conversion drives.

Our experts for training, recognized for their skills within GE Power Conversion, can make you benefit from their know-how, ceaselessly improved by their experience on the ground. They can give you theoretical and practical training in the various fields of our activity, on our workstations in the secure environment of our center, or even on your own equipment. We benefit from more than 25 years of operational experience in electric propulsion.



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