

2024 PENSKE CUSTOMER TRAINING PROGRAM



Australia & New Zealand

FOREWORD

Penske's technical training equips your team with the expertise and confidence they need to provide vital support to our customers.

This technical training program provides an overview of the training available to Penske customers.

The program outlines the following:

1. Information your staff need on various elements of the training program
2. An overview of course curriculums

Please take a moment to review the course prerequisites to ensure that you are fully prepared to undertake the training course.

For any technical training that you require outside of this program, please contact the National Technical Training Team at Penske.

We strive to provide our customers with an informative, flexible and cost-effective training program, and always welcome your feedback to enhance the customer learning experience.

Thank you,

Katherine Bandounas
Group Learning and Development Manager
Penske Australia and New Zealand

TABLE OF CONTENTS

Training Centres and Contacts	4
Training Request Form	5
DETROIT COURSES	
Series 60 Engines (PPS014)	7
DDEC IV Diagnostics (PPS002)	7
DDEC VI Diagnostics (PPS004)	7
DD15 Maintenance	8
Cooling Systems Maintenance	8
MAN COURSES	9
CVF-01a MAN Vehicle Fundamentals	11
CAZ-01c MAN-cats®3 Diagnostics, Workshop Manuals	11
CAF-03a Truck/Bus Service and Maintenance	11
CAE-04a Common Rail Fuel Diagnostics	12
CAE-05a Exhaust Gas After treatment	12
ALLISON TRANSMISSION COURSES	13
Allison 1000/2000 Maintenance	14
Allison 3000/4000 Maintenance	14
MTU COURSES (INCLUDING MERCEDES-BENZ)	15
Mechanical Training Courses	16
Mercedes Benz Training Courses	17
MTU Electronic Courses	18
Terms And Conditions	19

TRAINING CENTRES & CONTACTS

NEW SOUTH WALES TRAINING CENTRE

Sydney

1/7 Kildo Crescent
Glendenning NSW 2761
Phone: + 61 2 8602 6300
Fax: + 61 2 8602 6390

VICTORIA TRAINING CENTRE

Melbourne

488 Blackshaws Road
Altona North VIC 3025
Phone: +61 3 9243 9269
Fax: + 61 3 9243 9271

SOUTH AUSTRALIA TRAINING CENTRE

Adelaide

103-107 West Avenue
Edinburgh Park SA 5111
Phone: +61 8 8209 0000
Fax: + 61 8 8300 8110

WESTERN AUSTRALIA TRAINING CENTRE

Perth

22 Stockyards Lane
Hazelmere WA 6055
Phone: +61 8 9273 7787
Fax: + 61 8 9274 1051

QUEENSLAND TRAINING CENTRE

Brisbane

72 Formation Street
Wacol QLD 4076
Phone: +61 7 3271 7777
Fax: + 61 7 3271 2047

Key Contacts:

Russell Koch – Training Manager, DTNA

Phone: +61 438 125 63

Daniel Raine - Off Highway Technical Training Manager

Phone: +61 408 413 961

Craig Reid – MAN Training Manager

Phone: +61 436 115 291

TRAINING REQUEST FORM

(PLEASE SCAN)

Please complete the request form below and return it to the nearest Penske Training Centre. Once course numbers are confirmed you will receive a training offer outlining all dates and locations available and costs. On acceptance of the training offer your position on the course will be confirmed.

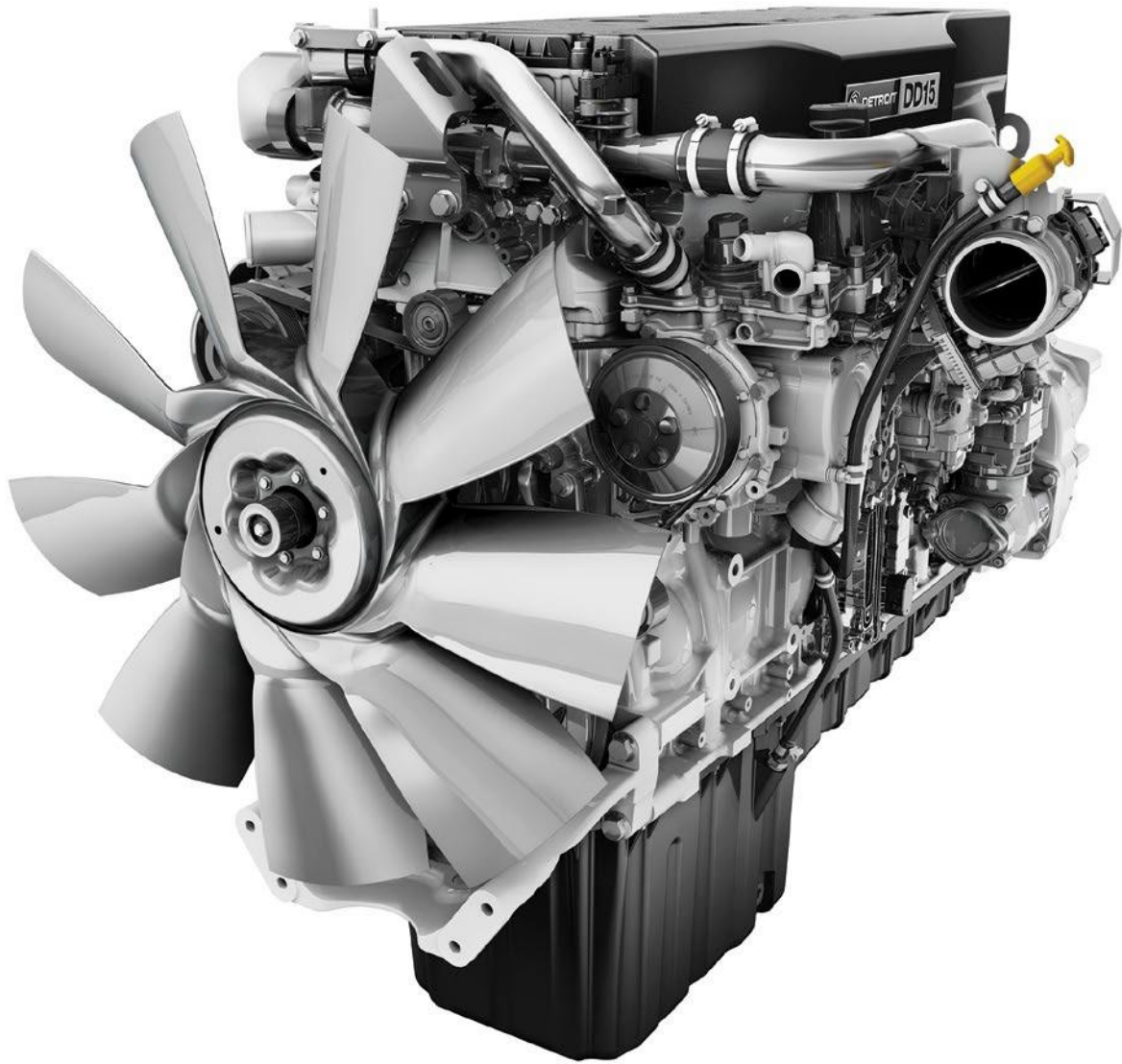
Applicant Name	
Employer Name	
Employer Address	
Suburb/Town	
Employer Phone No	
Employer Email Address	
Training Program	
Program Location	

Industry standard safety equipment and clothing, other than overalls and hearing protection are the responsibility of all attendees and their employers.

For any additional enquiries or to submit your registration, please contact the National Technical Training team.

Email: training@penske.com.au
Phone: +61 2 8602 6300
Fax: +61 2 8602 6390

Detroit Courses



DETROIT™

DETROIT COURSES

SERIES 60 ENGINES (PPS014)

COURSE OBJECTIVES

To provide service personnel with the skills and knowledge required to carry out maintenance, troubleshooting and repairs to all on highway Series 60 engine versions sold in Australia.

TARGET TRAINEES

Service and workshop personnel

PREREQUISITES

- Basic knowledge of diesel engines and course language

CURRICULUM

- Series 60 evolution
- Exhaust emission standards
- Engine construction
- Theory and operation of the Series 60 engine range
- Basic engine principles for fuel, air, lube and cooling systems
- Tune-up procedures
- Troubleshooting
- Special tools

PRACTICAL ACTIVITIES

- Injector replacement
- Camshaft replacement
- Camshaft thrust collar seal replacement
- Cylinder head replacement
- Adjustable idler gear backlash setting
- Engine timing verification
- Tune-up procedures

PARTICIPANTS

Four to eight

DURATION

Five days (instructor-led training)

DDEC IV DIAGNOSTICS (PPS002)

COURSE OBJECTIVES

To provide tradespersons with the skills necessary to diagnose, service and repair the DDEC single engine control module.

TARGET TRAINEES

Service and workshop personnel

PREREQUISITES

- Basic understanding of computer operating systems
- Basic understanding of electrical principles

CURRICULUM

- Electrical circuit testing principles
- DDEC system design and function
- Diagnostic code evaluation
- DDDL Diagnostic tool functions
- Handling of documentation

PRACTICAL ACTIVITIES

- Wiring harness repairs
- Practical DDEC troubleshooting exercises
- Electrical circuit testing
- Diagnostic tool use

PARTICIPANTS

Four to eight

DURATION

Two days (instructor-led training)

DDEC VI DIAGNOSTICS (PPS004)

COURSE OBJECTIVES

Provide service personnel with the skills and knowledge required to troubleshoot and repair the DDEC VI electronic control system as fitted to Series 60 ADR80/02 and DD Series engines.

TARGET TRAINEES

Service and workshop personnel

PREREQUISITES

- Sound knowledge of basic electrical concepts and diagnostics

CURRICULUM

- DDEC VI system design and function
- Diagnostic code evaluation
- Use of diagnostic tool
- Handling of documentation
- Wiring harness identification and repairs

PRACTICAL ACTIVITIES

- Identification of components
- Circuit identification and testing
- Utilisation of DDDL (current version)

PARTICIPANTS

Four to eight

DURATION

Two days (Instructor-led training)

DETROIT COURSES

DD15 MAINTENANCE

COURSE OBJECTIVES

Exposes tradespersons and advanced apprentices to the skills necessary to diagnose and service Detroit engines.

TARGET TRAINEES

Operators and maintainers

PREREQUISITE

- Basic knowledge of diesel engines and course language

CURRICULUM

- Identification and external components
- Systems overview
- Fluid and lubrication requirements
- Preventative maintenance
- Code handling and regeneration procedure

PRACTICAL ACTIVITIES

- Engine walk around
- Demonstration of prevention maintenance
- Demonstration of code handling and regeneration procedure

PARTICIPANTS

Four to eight

DURATION

Four hours (instructor-led training)

COOLING SYSTEMS MAINTENANCE

COURSE OBJECTIVES

To provide trades and aftersales personnel with the skills required to understand basic coolant chemistry and perform effective testing procedures to ascertain adequate cooling system protection levels are maintained.

TARGET TRAINEES

Personnel involved in either the sale or maintenance of cooling systems and additives.

CURRICULUM

- Coolant types and chemical compositions
- Effects and rectification of different coolant failure modes
- Coolant test and maintenance recommendations
- Use and maintenance of current coolant testing equipment
- Coolant sample taking and documentation handling

PRACTICAL ACTIVITIES

- Hands on testing of different coolant types including:
 - Standard life coolant
 - Long life coolant
 - Maintenance and calibration of testing equipment

PARTICIPANTS

Four to eight

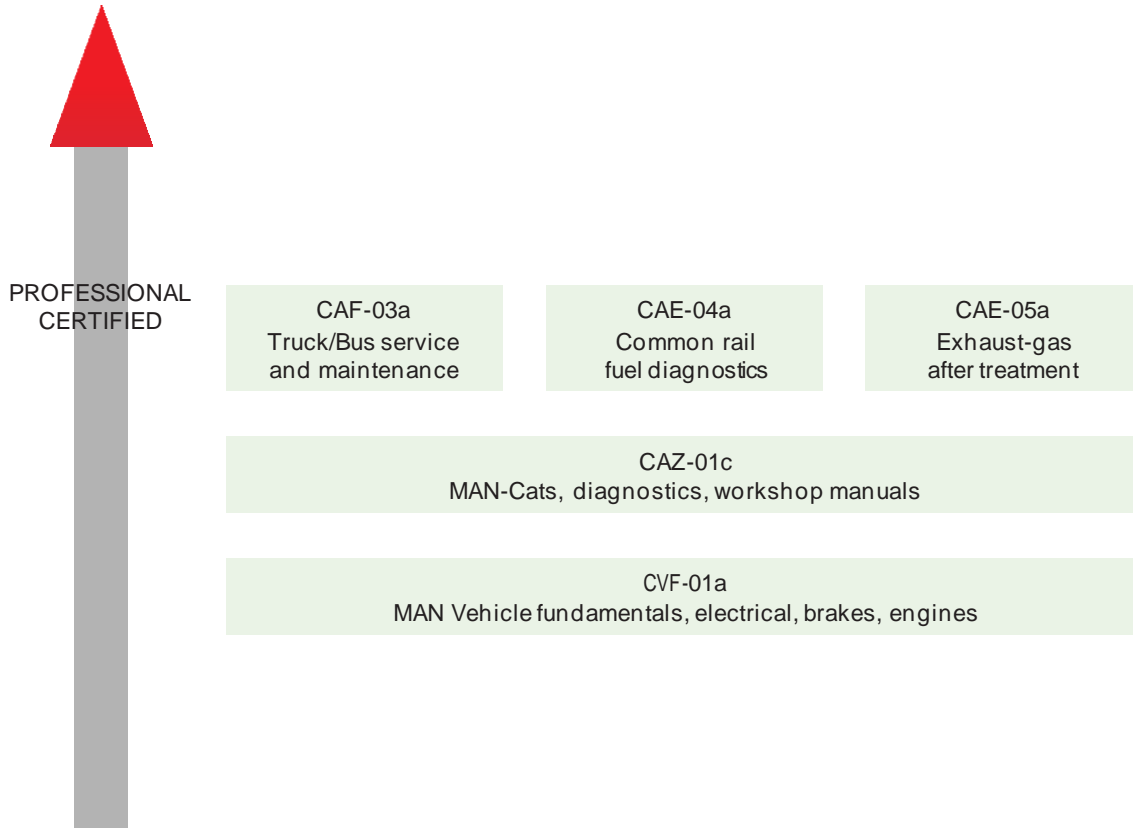
DURATIONS

One day (instructor-led training)

MAN Courses



MAN CUSTOMER TECHNICAL TRAINING



MAN COURSES

CVF-01A MAN VEHICLE FUNDAMENTALS

COURSE OBJECTIVES

Understanding the design and function of MAN electrical, electronics, air brakes and MAN diesel engines.

TARGET TRAINEES

Staff currently performing repairs on MAN trucks.

CURRICULUM

- Introduction to working with MAN wiring diagrams
- Explanation of electrical cable designations
- Explanation of electrical plug connections and their locations
- Introduction into CAN Bus and LIN networks
- Basic function of ZBR, FFR/PTM computers
- Design and function of pneumatic brake systems
- Individual pneumatic components and their operation
- Pneumatic circuit diagrams and their configuration
- Practical testing of the brake systems
- MAN engines and their identifications
- Structure and function of MAN engines
- Adjustments and service requirements when working on MAN engines

PARTICIPANTS

Four to eight

DURATION

Three days (instructor-led training)

CAZ-01C MAN-CATS®3 DIAGNOSTICS, WORKSHOP MANUALS

COURSE OBJECTIVES

Participants involved in the use of MC3 for diagnostics.

TARGET TRAINEES

Staff currently performing repairs on MAN trucks.

CURRICULUM

- How to use MC3
- MC3 information portal
- Connecting and diagnose basic systems
- Handling of vehicle data files, disposing of files
- Updating the MC3 laptop
- MAN Repair assistant
- Workshop manuals

PARTICIPANTS

Four to eight

DURATION

One day (instructor-led training)

CAF-03A TRUCK/BUS SERVICE AND MAINTENANCE

(Vehicle specific, identified at time of booking)

COURSE OBJECTIVES

Participants are able to perform scheduled maintenance and repairs in accordance with MAN recommendations.

TARGET TRAINEES

Staff currently performing repairs on MAN trucks.

CURRICULUM

- Vehicle and component maintenance requirements Euro 5
- Maintenance computer Euro 6
- MAN Service check sheets
- Approved service products MAN lubrication standards
- Service literature and service information sheets

PARTICIPANTS

Four to eight

DURATION

One day (instructor-led training)

MAN COURSES

CAE-04A COMMON RAIL FUEL DIAGNOSTICS

COURSE OBJECTIVES

Participants are able to identify the common rail components, understand complex fuel circuits and trouble shoot faults.

TARGET TRAINEES

Staff currently performing repairs on MAN trucks.

CURRICULUM

- Structure and function of EDC CR systems
- Individual components and their design
- Fuel circuits diagrams
- MAN-cats diagnostic and testing procedures
- Hydraulic testing procedure both low pressure and high pressure testing
- DLS tester, detection via leakage testing on the injectors

PARTICIPANTS

Four to eight

DURATION

Two days (instructor-led training)

CAE-05A EXHAUST GAS AFTER TREATMENT

(Vehicle specific, identified at time of booking)

COURSE OBJECTIVES

Participants are able to identify components in exhaust gas after treatment systems (EGR, SCR, Catalyst mufflers) and perform various trouble shooting techniques.

TARGET TRAINEES

Staff currently performing repairs on MAN trucks.

CURRICULUM

- Functional sequence of the different exhaust gas after treatment systems
- Design and legislation for Euro 4/5 and Euro 6
- EGR, exhaust gas recirculation Euro 5
- Low temperature concept Euro 5/6
- Ad Blue Euro 5/6
- Diagnostic and testing of the systems
- Service requirements and maintenance

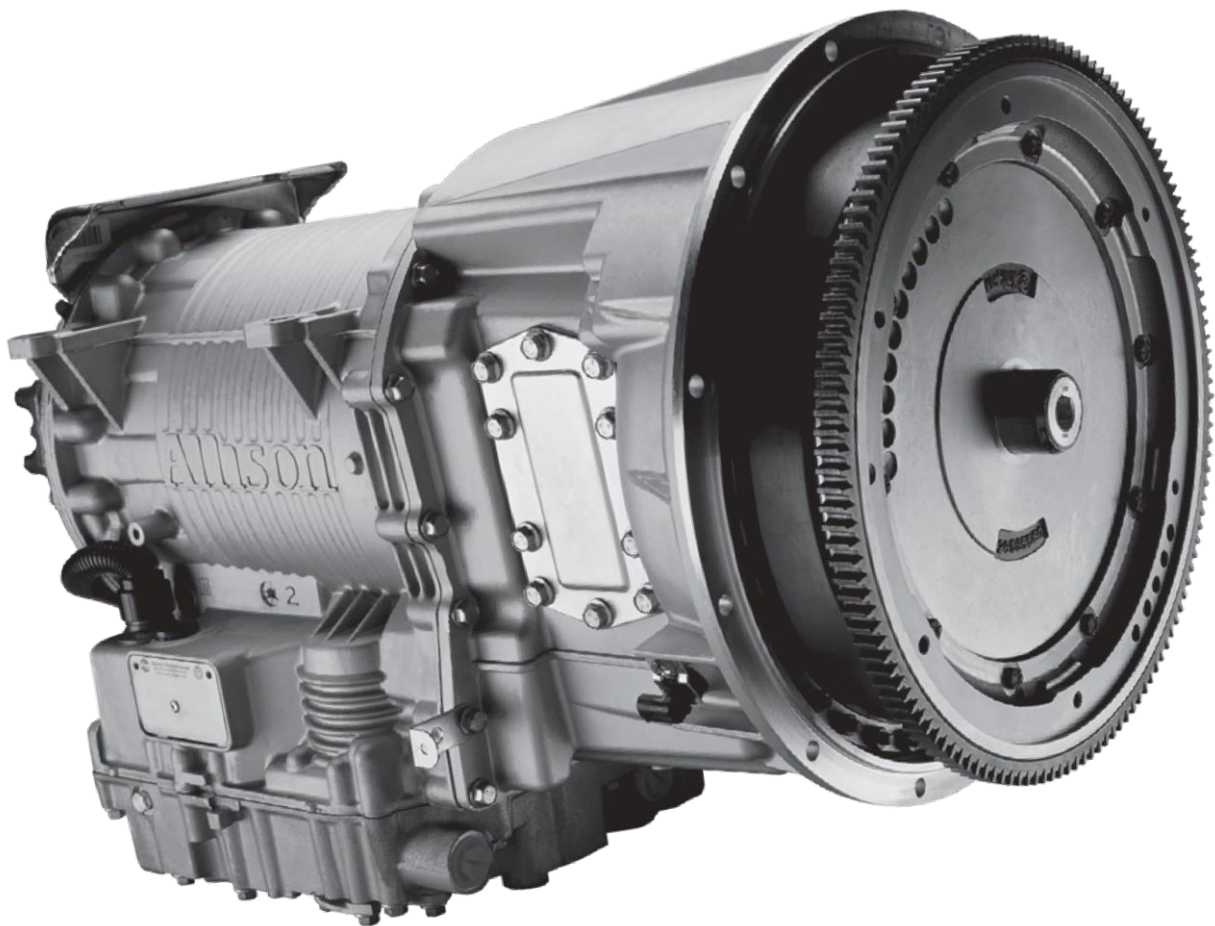
PARTICIPANTS

Four to eight

DURATION

One day (instructor-led training)

Allison Transmission Courses



ALLISON TRANSMISSION COURSES

ALLISON 1000/2000 MAINTENANCE

COURSE OBJECTIVES

Technicians will be capable of performing general diagnostics and maintenance level service and repairs on Allison 1000 and 2000 transmissions.

TARGET TRAINEES

Qualified tradesperson (or 3rd/4th year apprentices).

CURRICULUM

- Available resources for diagnostic service and repair (paper publications, service tools, online publications, resource access and use)
- 1000/2000 transmission configurations (external features, internal construction)
- Transmission operation (torque convertor, planetary gear and clutch operation, hydraulics and electronic control operating theory)
- Maintenance information and procedures
- Diagnostic procedures

PARTICIPANTS

Five to eight

DURATION

Two days (instructor-led training)

ALLISON 3000/4000 MAINTENANCE

COURSE OBJECTIVES

Technicians will be capable of performing general diagnostics and maintenance level service and repairs on Allison 3000 and 4000 transmissions.

TARGET TRAINEES

Qualified tradesperson (or 3rd/4th year apprentices).

CURRICULUM

- Available resources for diagnostic service and repair (paper publications, service tools, online publications, resource access and use)
- 3000/4000 transmission configurations (external and internal construction)
- Transmission operation (torque convertor, planetary gear and clutch operation, hydraulics and electronic control operating theory)
- Maintenance information and procedures
- Diagnostic procedures

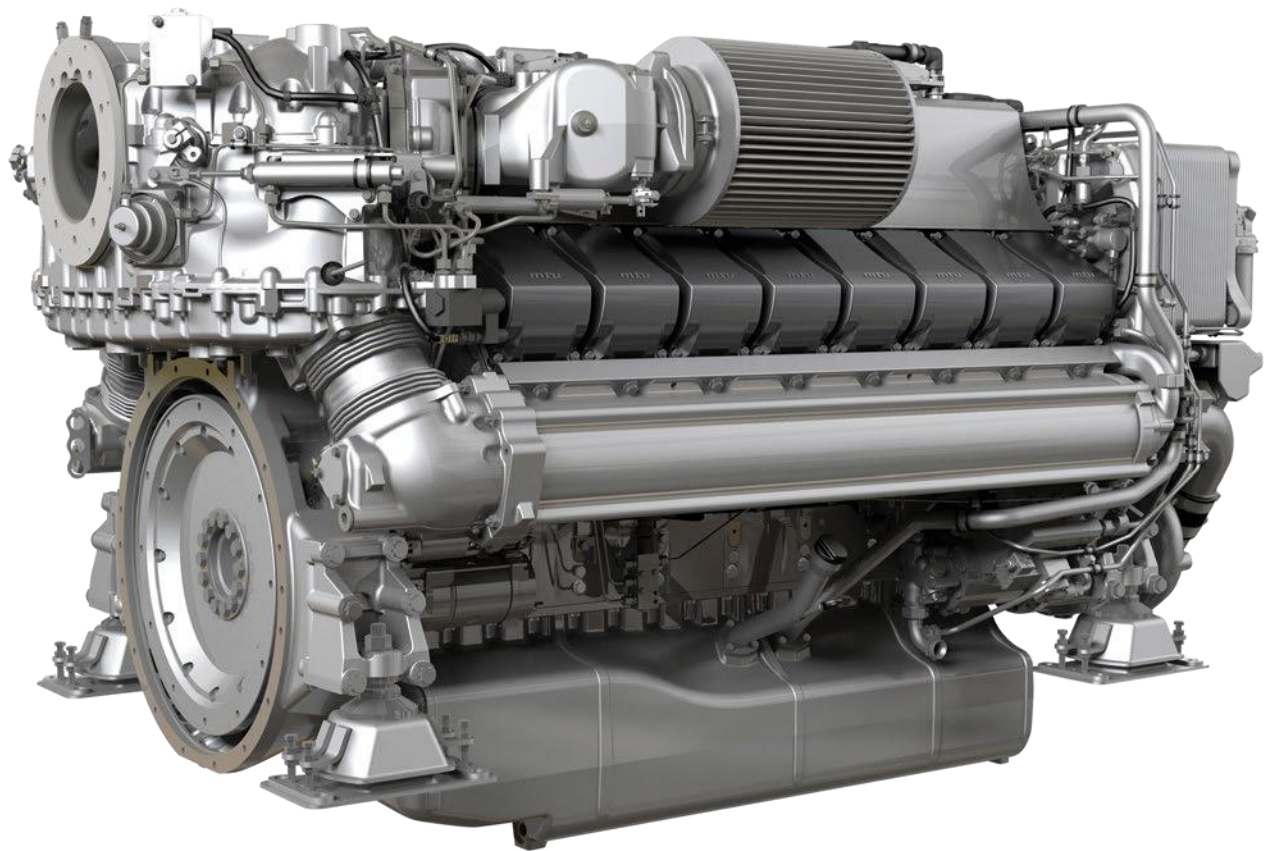
PARTICIPANTS

Five to eight

DURATION

Two days (instructor-led training)

MTU Courses (including Mercedes Benz)



A Rolls-Royce
solution



Mercedes-Benz

MTU COURSES (INCLUDING MERCEDES-BENZ)

CUSTOMER MECHANICAL PROGRAMS CMO/X

Series	C&I	Genset	Marine	Rail
OM Series	x	--	--	--
60	x	--	x	--
1000	x	--	--	--
1100-1500	x	--	--	--
1600	--	x	--	--
2000 PLD	x	x	x	--
2000 CR	--	--	x	--
4000-01	x	x	x	--
4000-02	x	x	--	--
4000-03	x	x	--	x

COURSE OUTLINE

- Engine operation and related systems
- Identification and remedy of minor faults
- Preventative maintenance tasks

TARGET TRAINEES

Operators and maintainers

PREREQUISITE

Basic knowledge of diesel engines and course language.

CURRICULUM

Customer tailored content, including;

- Handling of documentation
- Introduction of the engine
- Explanation of the engine systems
- Explanation of the fluids and lubricants specification
- Basic troubleshooting
- Preventative maintenance
- Introduction to engine management system

PARTICIPANTS

Five to eight

DURATION

Upon request

CUSTOMER MECHANICAL PROGRAMS CM1/X QUALIFICATION LEVEL QL1: PREVENTATIVE MAINTENANCE

Series	C&I	Genset	Marine	Rail	Duration
OM Series	x	--	--	--	3 days
60	x	--	x	--	2 days
1000*	x	--	--	--	3 days
1100-1500*	x	--	--	--	3 days
1600	--	x	--	--	2 days
2000 PLD	x	x	x	--	2 days
2000 CR	--	--	x	--	2 days
4000-01	x	x	x	--	2 days
4000-02	x	x	--	--	2 days
4000-03	x	x	--	x	2 days

COURSE OUTLINE

- Engine design, structure and function
- Engine operation and related systems
- Identification and remedy of minor faults
- Preventative maintenance tasks

TARGET TRAINEES

Maintainers

PREREQUISITE

Basic knowledge of diesel engines and course language.

CURRICULUM

- Handling of documentation
- Design and function of the engine
- Explanation of the air, fuel, lubrication and cooling systems
- Explanation of the fluids and lubricants specification
- Basic troubleshooting
- Preventative maintenance tasks QL1

PARTICIPANTS

Five to eight

*CME1-C Including engine electronic control introduction and diagnostics tool operation

MTU COURSES (INCLUDING MERCEDES-BENZ)

TEMIC CE1/C

COURSE OUTLINE

Diagnose, service and repair the TEMIC engine control system fitted to Mercedes-Benz OM series engines.

TARGET TRAINEES

Service and workshop personnel.

PREREQUISITE

- Basic understanding of computer operating systems
- Electronic operating principles

CURRICULUM

- Operational theory and practical application of the TEMIC system
- Basic electrical principles and wiring schematics
- Practical experience in harness repair
- System troubleshooting techniques
- Correct use of diagnostic equipment

PARTICIPANTS

Five to eight

DURATION

Two days (instructor-led training)

XENTRY DIAGNOSTICS FOR OM SERIES ENGINES (INCLUDES NEW CPC4-ECAN MODULE)

COURSE OUTLINE

Use the Xentry tool to perform diagnostics & handle parameter sets on Mercedes-Benz Temic electronic control system.

TARGET TRAINEES

Service and workshop personnel.

PREREQUISITE

- Basic understanding of computer operating systems
- Temic CE1/C course

CURRICULUM

- Handling of documentation
- Design & function of the CPC4-ECAN control module
- Converting the Temic system from ADM2/3 to CPC4-ECAN
- Initial set-up of the Xentry tool
- Connecting to Temic control modules
- Accessing diagnostics codes and troubleshooting help
- Viewing actual values
- Performing actuations
- Handling parameter sets

PARTICIPANTS

Five to eight

DURATION

One day (instructor-led training)

MTU COURSES (INCLUDING MERCEDES-BENZ)

MTU ELECTRONICS

At Penske we offer courses to meet both your operators (CE1) and on board maintainers (CE2) needs in the support of the MTU Electronic Engine Control Systems and MTU Engine Monitoring and Control Systems.

Engine Control System	C&I	Genset	Rail	Marine
ADEC Uni (for 1163 Series)				x
ECU 4 (MDEC)	x	x		x
ECU 7 (ADEC)	x	x	x	x
ECU 8	--	x		--
ECU 9	--	x		--
DDEC IV	x			

Engine Monitoring System
MCS-5
SmartLine
BlueLine
BlueVision

CE1

COURSE OUTLINE

- Proficiency in system function and set up
- Operation of the system

TARGET TRAINEES

Operators

PREREQUISITE

- Knowledge of the main system functions
- Technical comprehension

CURRICULUM

- Introduction to the scope of electronics
- Handling of documentation and drawings
- System structure, design & operations
- Troubleshooting via display navigation

SCHEDULE

To be agreed

PARTICIPANTS

Up to eight persons

CE2

COURSE OUTLINE

- System maintenance
- Troubleshooting and corrective action
- Using test/measurement equipment

TARGET TRAINEES

Maintainer

PREREQUISITE

- Mechanics or electronics system knowledge

CURRICULUM

- Introduction to the scope of electronics
- Handling of documentation and drawings
- System structure, design & operations
- Explanation of sensors & actuators
- System configuration
- Replacing complete units
- Introduction of the dialog unit (basic level 1a)
- Data recording and error codes
- Troubleshooting via display navigation and dialog unit

SCHEDULE

To be agreed

PARTICIPANTS

Up to eight persons

TERMS AND CONDITIONS

1. Application

Applications for participation in Penske Australia Pty Ltd (PAU) training courses are to be submitted in writing using the PAU application form included in this training program providing details of the desired course.

Submission of an application indicates recognition of the following conditions:

- The applicant is bound by their application until six weeks after its receipt by PAU.
- The contract is finalised on issue of a written acceptance of application by PAU. In the case of courses for which the maximum number of participants has already been accepted, the applicant will be informed and given details of the next available course.
- The data received with the application will be treated confidentially, in compliance with the current data protection legislation, and recorded for internal administration purposes. The applicant hereby acknowledges and accepts that any personal information received by PAU may be reasonably expected to be used for a secondary purpose associated with the application or conduction of the training course.

2. Cancellation

The contract may be cancelled in writing:

By PAU

- When the number of applicants does not allow economical completion of the course.
- In the event of sickness of the instructor or for any other important reason.
- Course fees already received in payment will be returned.
- No other form of regress is possible.

By the customer

- Free of charge up to four weeks prior to the scheduled commencement of the course.
- In the case of cancellations received by PAU later than four weeks but more than 14 days, at the latest, prior to the scheduled commencement of the course, 50% of the agreed fees shall be forfeited.
- In the case of cancellations received by PAU later than 14 days prior to scheduled commencement of the course, or by non-appearance of the trainee the full amount of fees shall be payable.
- The customer has the right, with no increase in cost, to send an alternative trainee to participate in any courses that have been reserved and paid for.

3. Execution deviations

PAU reserves the right to provide a substitute instructor, to slightly modify, or up-date, the course curriculum and, with adequate notice, to change the course schedule and location. If the customer is unable to participate in a course due to modification of the schedule, they are entitled to a course reservation on another schedule.

4. Qualifications

The qualifications listed in the course descriptions are prerequisites for the course participation. In the interests of all concerned, the instructor assigned to a specific course shall decide as to the participation of any trainee whose qualifications are not as specified.

5. Course fees

Course fees are stated in the registration confirmation and are net prices without discount or other form of rebate. Payments are to be effected as indicated on the registration confirmation. Payment by the due date is a prerequisite for participation in the training.

6. Copyright

PAU reserves all rights to the training documentation, including translation, reprints and copying, either the whole or extracts thereof. No part of the training documentation may be reproduced in any way, in particular by the employment of electronic systems, nor shall it be copied, dispersed or used for open publication, without the prior permission, in writing, of PAU.

7. Copyright protection

The software employed during courses of instruction is subject to copyright protection. The software may not be removed from the training areas, nor may it be copied either the whole or part thereof or otherwise rendered useable in any non-approved form. Rights of use of PAU software products, or other third parties, as far as these are required for completion of the course curriculum are included in the course fees for the duration of the course. All kind of documentation from PAU may not be copied without permission. We reserve the right to claim recompense for any damages whatsoever.

8. Limits of liability

The courses are prepared and executed with great care and expertise by instructors from PAU. Except in cases of gross negligence or serious/wilful misconduct PAU is not liable to the applicant in anyway whatsoever.

PAU shall not be liable for any indirect, special or consequential loss of any kind suffered by the applicant (including loss of profit, revenue or income, production, use, product, business, contracts, investment or other opportunity) arising out of or in connection with the application or the participation in the training course, whether in contract, tort (including negligence) or equity, under statute or otherwise.

No liability is accepted for the loss or damage to course participant's personal property during courses conducted in buildings and on property owned by PAU.

Notwithstanding any other provision in this document, PAU total aggregate liability in connection with the application or the training courses is limited to AU\$100,000.00.

9. Place of jurisdiction

The place of jurisdiction for all controversies arising from the contract is the State of New South Wales. The parties hereby accept that the laws of that State shall apply exclusively to this application and the training course in general.



Australia & New Zealand

training@penske.com.au

penske.com.au



A Rolls-Royce
solution



DETROIT.

