

Crane Care Training - Course catalog 2021

Dubai – United Arab Emirates



Manitowoc Training

CONTACTS TRAINING CENTER



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TRAINING CENTER OBJECTIVES

Location

- Jebel Ali Free Zone
Dubai, UAE

Our Equipment — An Investment in High-Quality Training

- Designated Training room.
- Various Crane specific simulators.
- Training Crane(s) available on demand.

Our International Profile

- Hundreds of trainees from the region pass through the training center annually.
- Lectures are conducted in the English language.
(other languages available on demand)

Our Certifications

- All conducted training courses are accredited by the Manitowoc Training Centers in the United States and Germany.

Our Global Offer

- Thirteen 1 week training modules covering; Crane Foundation, Operator, Rough Terrain, All Terrain Cranes and Custom designed courses according to your needs.

Training Equipment

- Crane specific simulators.
- Various Crane models (on demand).

Cost:

- Refer to schedule
- In order to avoid misunderstandings, please inform all trainees that hotel rooms, meals and other expenses, i.e. telephone, weekend trips, taxi, etc. are not included and must be paid by trainee.

Find Us on Our Website

www.manitowoccranes.com

Contact Us

kavungal.firoz@manitowoc.com

PRACTICAL INFORMATION

Travel arrangements:

Please inform the Training Center of the trainee's travel arrangements. If they are flying to Dubai, we can assist with hotel bookings, transportation, visa applications, etc.

Registration:

Dates are tentative and registration is based on a "first come, first serve" basis with a priority to confirmed (prepaid) orders.

You will find enclosed "registration purchase order" forms which must be filled in and returned to the Training Center for confirmation. Trainees must be over 18 years old and must be declared fit to work at heights.

Trainees are expected to fully respect the safety rules of the facility where the training is taking place.

MANITOWOC denies responsibility for accidents and/or illnesses that might occur during the training courses. We therefore request, that you cover your trainees against any kind of risks and provide them with the necessary insurance certificates and forms.

Clothing:

Most of our training programs involve numerous practical exercises outside. Please let the trainees know that they should therefore bring suitable shoes and clothing. We will lend gloves, safety glasses and helmets to the trainees.

For the practical parts of the training: working clothes, gloves and steel-capped shoes are needed.

Laptop PC:

For training courses, where a laptop is required, this must have the following specifications:

- Windows 7 Professional Service Pack 1 or higher, Windows 8 or Windows 10 in a 32bit or 64bit version
- minimum 1366 x 768 display resolution
- x86 compatible processor
- minimum 4 GB RAM
- minimum 120 GB free HDD space
- Serial (RS232) interface or USB to serial converter with FTDI chipset
- Local administration rights
- MS Access or MS Access viewer in 32bit version
- Adobe Reader and Adobe Flash Player
- 1 free USB - Port

Cancellation:

In case of cancellation, please inform the training Center immediately in order to avoid extra charges.

COURSE SUMMARY

Product Line	Course Name	Location
Section 1 Introduction courses Page 07-08		
	Crane System Theory	Dubai, UAE
	Crane Technology & Operation	Dubai, UAE
Section 2 Rough Terrain courses Page 10-14		
Grove RT	GROVE 1.1 (Intro to CANBUS)	Dubai, UAE
	GROVE 2.1 (Service Tool / CanLink)	Dubai, UAE
	GROVE 3.1 (Orchestra)	Dubai, UAE
	GROVE 4.1 (Hybrids)	Dubai, UAE
	GROVE 5.1 (CCS)	Dubai, UAE
	GROVE 6.1 (Flashing)	Dubai, UAE
	CERTIFICATION	Shady Grove, USA
Section 2 All Terrain courses Page 16-21		
GMK	GMK 1.1 (Operational Aspects)	Dubai, UAE
	GMK 2.1 (Electric & Hydraulic)	Dubai, UAE
	GMK 3.1 (ECOS ESX Tech. & Diag.)	Dubai, UAE
	GMK 4.1 (CCS Tech. & Diag.)	Dubai, UAE
	GMK 5.1 (EKS 4 & 5 Tech. & Diag.)	Dubai, UAE
	GMK 6... (Engine & Transmission)	Wilhelmshaven, Germany
	GMK 7.1 (Steer By Wire)	Dubai, UAE
	GMK 8.1 (Update "6" 6300L & 6400)	Wilhelmshaven, Germany
	CERTIFICATION	Wilhelmshaven, Germany

Introduction Courses

COURSE NAME	Page
Crane System Theory	7
Crane Technology & Operation	8



CRANE INTRODUCTION

Crane System Theory

CST

Aim of Training Course

This course is designed to provide a basic understanding of hydraulic, electrical and pneumatic principles and how they are applied on the different Manitowoc product lines and will be used as a prerequisite for all introductory level courses.

Program

This course will consist of classroom time utilizing programs covering the basics of hydraulic, electrical and pneumatics along with their components and how these components operate and interact with each other. Schematics are used to help the students gain an understanding of schematic layouts and component symbols used on the different product lines.

Training Methods

5 days theory and practice in hydraulic, electrical and pneumatic schematics and systems. Hydraulic and Electrical test benches are incorporated into the course to help give the student a better understanding of the hydraulic and electrical theories learned in the classroom portion of the training

Materials and Classrooms Used

Training room
Technical documents
Simulator

Validation of Knowledge

Daily homework, Daily tasks and Final test at the end of the training course.
Presentation of certificate

Prerequisites

- The trainees must be over 18 years old
- The trainees have to bring safety shoes and working clothes

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 03.01.2021 – 07.01.2021
- 11.04.2021 – 15.04.2021
- 11.07.2021 – 15.07.2021
- 17.10.2021 – 21.10.2021

Cost

Training cost \$1,250.00*

*Training conducted in the UAE is subject to 5% VAT

Aim of Training Course

This program assumes no basic service and operational knowledge of Grove Rough Terrain, Truck Mounted and All Terrain crane systems. We start the course with an in-depth review of crane terminology and technologies so the students can relate to a crane's individual components and systems. Programs covering Grove RT load charts are used to expose the students to how load charts are constructed and how to properly read and interpret them. After completion of the RT cranes, the study will move forward into the GMK product line, here the students will be exposed to the GMK style load charts. Exercises will be conducted in class to assure a full grasp of both product types.

Program

Safety Devices, Load capacity charts, Outrigger loads, Wind loading, Operator Manuals, Crane terminology & symbols, PAT and EKS/RCI appreciation, swing-away-lattice, power tilt jib, luffing jib, Mega wing lift

Training Methods

Detailed theory of operation,
Use of specific documents

Materials and Classrooms Used

Training room
Technical documents

Validation of Knowledge

Daily homework, Daily tasks and Final test at the end of the training course.
Presentation of certificate

Prerequisites

- The trainees must be over 18 years old
- The trainees have to bring safety shoes and working clothes

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 10.01.2021 – 14.01.2021
- 18.04.2021 – 22.04.2021
- 18.07.2021 – 22.07.2021
- 24.10.2021 – 28.10.2021

Cost

Training cost \$1,250.00*

*Training conducted in the UAE is subject to 5% VAT

Rough Terrain Courses

COURSE NAME	Page
GROVE 1.1 (Intro to CANUS)	10
GROVE 2.1 (Service Tool & CanLink	11
GROVE 3.1 (Orchestra)	12
GROVE 4.1 (Hybrids)	13
GROVE 5.1 (CCS)	14
GROVE 6.1 (Flashing)	15



Intro to CANBUS

GROVE 1.1

Aim of Training Course

Have the basic understanding of LMI systems and circuits. Properly check the systems voltage supplies and circuit measuring points. Be able to properly replace main boards, pressure transducers and perform basic system adjustments. Receive the PAT LMI Error code viewers.

Program

The course takes the students into the inner workings of the LMI systems through explanations of the overall system schematics. In-depth sessions covering the individual circuits, digital inputs, measuring channels, and basic adjustments will give the student the foundation necessary for the troubleshooting phase. System induced problems will provide students the opportunity to utilize the troubleshooting manuals and procedures learned to diagnosis and repair the problems.

Training Methods

Lectures and practical exercises (measurements & adjustments). Practical Trouble-shooting on an RT crane or simulators.

Materials and Classrooms Used

Technical documents, Simulators and Crane(s).

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- Crane System Theory and
- Crane Technology and Operation

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 17.01.2021 – 21.01.2021
- 25.04.2021 – 29.04.2021
- 25.07.2021 – 29.07.2021
- 31.10.2021 – 04.11.2021

Cost

Training cost \$1,650.00*

*Training conducted in the UAE is subject to 5% VAT

Service Tool & CanLink

GROVE 2.1

Aim of Training Course

Identify components used on the RT cranes and explain their basic function. Make system checks using recommended test procedures and be able to understand the indicated readings. Troubleshoot system problems utilizing schematics and service software.

Program

This program assumes basic knowledge of operation, and hydraulic & electrical systems as covered in the previous courses. Students will gain an understanding of components and systems through the intense study of system schematics. HED Service Software will be loaded onto student's laptops. The class is divided into groups and assigned to a crane to review the hydraulic and electrical system components on that model. Students are required to conduct test procedures to troubleshoot and repair problems induced on their crane.

Training Methods

Lectures and practical exercises (measurements & adjustments). Practical Trouble-shooting on an RT crane or simulator(s).

Materials and Classrooms Used

Technical documents, Simulators and Crane(s).

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- GROVE 1.1 (Intro to CANBUS)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 24.01.2021 – 28.01.2021
- 02.05.2021 – 06.05.2021
- 01.08.2021 – 05.08.2021
- 07.11.2021 – 11.11.2021

Cost

Training cost \$1,650.00*

*Training conducted in the UAE is subject to 5% VAT

Orchestra

GROVE 3.1

Aim of Training Course

Identify components used on the RT cranes and explain their basic function. Make system checks using recommended test procedures and be able to understand the indicated readings. Troubleshoot system problems utilizing schematics and service software.

Program

This program covers current CANBus technology used on Grove RT cranes. This gives the students a working knowledge of these systems and a foundation for proper troubleshooting techniques and test procedures. Orchestra Software will be loaded onto student's laptops for the purpose to conduct hands-on sessions covering proper software operation and trouble shooting techniques. A portion of the class will cover current OMS (Outrigger Monitoring System) systems used on today's RT and TM/TMS models.

Training Methods

Lectures and practical exercises (measurements & adjustments). Practical Trouble-shooting on an RT crane.

Materials and Classrooms Used

Technical documents, Simulators and Crane(s).

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- GROVE 2.1 (Service Tool & CanLink)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 31.01.2021 – 04.02.2021
- 09.05.2021 – 13.05.2021
- 08.08.2021 – 12.08.2021
- 14.11.2021 – 18.11.2021

Cost

Training cost \$1,750.00*

*Training conducted in the UAE is subject to 5% VAT

Hybrids

GROVE 4.1

Aim of Training Course

Have basic knowledge of operation, hydraulic & electrical systems of TMS9000E and RT9150E models.

Program

This program covers current CANBus technology used on Grove hybrid cranes. Students will gain an understanding of components and systems through the intense study of system schematics. A session will familiarize the students with the operation of the ECOS and EKS systems used on these models. Sessions on reading ELAN schematics and Service Software operation will give students the basics for applying trouble shooting techniques. Hands on sessions will be conducted to re-enforce classroom material on system operation and diagnostics.

Training Methods

Lectures and practical exercises (measurements & adjustments). Practical Trouble-shooting on a Hybrid crane.

Materials and Classrooms Used

Technical documents, Simulators and Crane(s).

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- GROVE 3.1 (Orchestra)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 07.02.2021 – 11.02.2021
- 15.08.2021 – 19.08.2021

Cost

Training cost \$1,750.00*

*Training conducted in the UAE is subject to 5% VAT

CCS

Aim of Training Course

Have an understanding of CCS systems. Have the foundation to troubleshoot system problems by utilizing the schematics and service software procedures on current production CCS cranes.

Program

This course will cover the new operating system that will be across all Manitowoc products in the future. Only Shady Grove products will be covered. The course will walk the students through overall setup and navigation of new components such as the displays and all other cabin related CCS system setup. After the system itself is thoroughly understood, Students will be walked through the entire crane electrically and hydraulically with the aid of schematics. The final portion of the class will cover the new CST service software which will be used to diagnose electrical issues and calibrate sensors .

Training Methods

Lectures and practical exercises (measurements & adjustments). Practical Trouble-shooting on a CCS crane or Simulator.

Materials and Classrooms Used

Technical documents and crane/simulator.

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

GROVE 5.1

Prerequisites

- GROVE 3.1 (Orchestra)/4.1 (Hybrids)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 14.02.2021 – 18.02.2021
- 16.05.2021 – 20.05.2021
- 22.08.2021 – 26.08.2021
- 21.11.2021 – 25.11.2021

Cost

Training cost \$1,950.00*

*Training conducted in the UAE is subject to 5% VAT

Flashing

GROVE 6.1

Aim of Training Course

Have an understanding of Flashing and Calibration of all major components on past and current Grove Rough Terrain cranes.

Program

This course covers FLASHING & CALIBRATION of the following:

- 1.) Flashing / loading software for Gen.1, Gen.2 & Gen.3 HED based machines. Including loading of 770 charts, CAN open transducer calibration along with the use of Application Configurator program to upload error logs for diagnostics.
- 2.) Flashing of all Hirschman components. I-Flex 2 I-Flex 5 and the current Expert systems 2/5. All central units and displays will be covered.
- 3.) Flashing of all ECOS related control units, both ESX and GVIOM, RT9150 and TMS 9000 related.
- 4.) Flashing of Wylie I-4300, I-4500 LMI's for YardBoss and ShuttleLift.
- 5.) Flashing and Calibration of new Crane Control System (CCS)

Training Methods

Lectures and practical exercises (measurements & adjustments). Practical Trouble-shooting on a CCS crane or Simulator.

Materials and Classrooms Used

Technical documents and crane/simulators.

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- GROVE 5.1 (CCS)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 21.02.2021 – 25.02.2021
- 23.05.2021 – 27.05.2021
- 29.08.2021 – 02.09.2021
- 28.11.2021 – 02.12.2021

Cost

Training cost \$1,950.00*

*Training conducted in the UAE is subject to 5% VAT

All Terrain Courses

COURSE NAME	Page
GMK 1.1 (Operational Aspects)	17
GMK 2.1 (Electrics & Hydraulics)	18
GMK 3.1 (ECOS ESX Tech. & Diag.)	19
GMK 4.1 (CCS Tech. & Diag.)	20
GMK 5.1 (EKS 4 & 5 Tech. & Diag.)	21
GMK 7.1 (Steer By Wire)	22



GMK Operational Aspects

GMK 1.1

Aim of Training Course

This course is designed for individuals who are new to GMK cranes but would also be an excellent refresher course for more experienced technicians. The course covers the setup and operation focused toward current production GMK cranes. The course will be approx. 40% classroom and 60% practical.

Program

The course features a GMK crane and will cover the carrier controls and proper use of transmission and driving controls, outriggers, suspension and rear steering system. Superstructure cab controls will be covered including the proper setup of the ECOS & EKS systems. Hands-on operation of the boom in semi-automatic and automatic modes. Each student will be expected to demonstrate proficiency in all aspects of crane setup and operation. Each student will also be given tasks to complete during the week to include load chart, outrigger pad load, maintenance manual, and operator's manual exercises.

Training Methods

Lectures and practical exercises on GMK crane.

Materials and Classrooms Used

Technical documents, simulator and crane.

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- Crane System Theory and
- Crane Technology and Operation

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 28.02.2021 – 04.03.2021
- 30.05.2021 – 03.06.2021
- 05.09.2021 – 09.09.2021

Cost

Training cost \$2,250.00*

*Training conducted in the UAE is subject to 5% VAT

GMK Electrics & Hydraulics

GMK 2.1

Aim of Training Course

Designed as an introduction to the technology of GMK cranes. The student will gain a deeper knowledge of the electrical system of the crane and a guide line for trouble shooting the electrical and hydraulic system.

Program

Overview of the electrical function groups, navigating through the electrical schematics (ELAN and SEE), connection between electrical, hydraulic and pneumatic schematics tasks on trouble shooting electrical systems.

Overview of hydraulic components and their schematic symbols Navigation through the hydraulic schematics Overview of the carrier hydraulics and pneumatics system Overview of the superstructure hydraulic systems.

Training Methods

Lectures and practical exercises on simulator.
Interactive presentations and use of test benches.

Materials and Classrooms Used

Technical documents and crane/simulators.

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- GMK 1.1 (Operational Aspects)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 07.03.2021 – 11.03.2021
- 06.06.2021 – 10.06.2021
- 12.09.2021 – 16.09.2021
- 05.12.2021 – 09.12.2021

Cost

Training cost \$1,850.00*

*Training conducted in the UAE is subject to 5% VAT

Aim of Training Course

This course will show the technology (design and function) and the diagnostic (troubleshooting, adjustment, flashing) of ECOS "Electronic Crane Operating System". This training shows the detailed theory of the operating system and its control application for particular functions and in the practical part the logical troubleshooting with the aid of the ECOS Service Software for adjusting, flashing and configuration.

Program

ESX modules, I/O boards, GVIOM, display, MMI, AMG/AMM, joysticks, level sensor, precision length sensor

PWM, digital outputs

Digital and analog inputs

CAN-Bus systems

Sensors and actuators

Appreciation of logical troubleshooting and error code diagnostics.

Adjustments of inputs and outputs with ECOS Service Software.

Flashing / Updating of ESX modules and displays.

Training Methods

Pre test

detailed theory of operation

Materials and Classrooms Used

Training room

Technical documents

Crane

Simulator

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- GMK 2.1 (Electrics & Hydraulics)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 14.03.2021 – 18.03.2021
- 13.06.2021 – 17.06.2021
- 19.09.2021 – 23.09.2021
- 12.12.2021 – 16.12.2021

Cost

Training cost \$1,850.00*

*Training conducted in the UAE is subject to 5% VAT

Aim of Training Course

This course will show the technology (design and function) and the diagnostic (troubleshooting, adjustment, flashing) of CCS "Crane Control System". This training shows the detailed theory of the operating system and its control application for particular functions and in the practical part the logical troubleshooting with the aid of the CCS Service Software for adjusting, flashing and configuration.

Program

CCS modules, display, joysticks, jogdail, HMI, level sensor, precision length sensor

PWM, digital outputs

Digital and analog inputs

CAN-Bus systems

Sensors and actuators

Appreciation of logical troubleshooting and error code diagnostics.

Adjustments of inputs and outputs with CCS Service Software.

Flashing / Updating of CCS modules and displays.

Training Methods

Lectures and practical exercises. Practical Troubleshooting on a GMK crane and/or simulator.

Materials and Classrooms Used

Technical documents and crane/simulator.

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- GMK 3.1 (ECOS ESX & CCS Technology)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 21.03.2021 – 25.03.2021
- 20.06.2021 – 24.06.2021
- 26.09.2021 – 30.09.2021
- 19.12.2021 – 23.12.2021

Cost

Training cost \$1,950.00*

*Training conducted in the UAE is subject to 5% VAT

GMK EKS 4 & 5 Technology and Diagnostics

GMK 5.1

Aim of Training Course

This training will show the RCL systems EKS4 and EKS5, the principles and technology.

In this training course the participants will attain the diagnostic level of EKS4 and EKS5.

Program

History of EKS systems, crane physics, EKS/RCL technology, EKS4 & EKS5, bus node cards, tilt I/O boards, pressure transducers, slewing sensors, standard display / graphic display, CAN-Bus system for sensors Communication to ECOS, error code diagnostics & diagnostic tools, addressing of sensors, addressing and flashing of tilt I/O boards, flashing of graphic display flashing of EKS5, adjustment of RCL system with service software.

Training Methods

Lectures and practical exercises. Practical Troubleshooting on a GMK crane and/or simulator.

Materials and Classrooms Used

Technical documents and crane/simulator.

Validation of Knowledge

Daily homework, tasks and final test at the end of the course.

Prerequisites

- GMK 4.1 (ECOS ESX & CCS Diagnostics)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 28.03.2021 – 01.04.2021
- 27.06.2021 – 01.07.2021
- 03.10.2021 – 07.10.2021
- 26.12.2021 – 30.12.2021

Cost

Training cost \$1,950.00*

*Training conducted in the UAE is subject to 5% VAT

GMK ECOS and Mobil Elektronik Steer by Wire

GMK 7.1

Aim of Training Course

Advanced training course complementing Diagnostic Phase "ECOS Diagnostics"

The "Steer by Wire" course will provide detailed knowledge of this specific system.

Due to legal regulations: Work and/or repair on SBW systems is only authorized to those who have successfully completed this course.

Program

Steer by Wire control units ESX 4 and ESX 5
Introduction of tempsonic sensors

Steer by Wire control units from Mobil Elektronik,
Laptop computer as a service tool with applied
Steer by Wire – software Flashing of units

Calibration and adjustment of the ECOS and Mobil
SBW system

Logical troubleshooting

Error codes diagnostics and diagnostics tools

Training Methods

Pre test

Detailed theory

Practical tasks on the crane

Materials and Classrooms Used

Training room

Technical documents

GMK crane with SBW

Validation of Knowledge

Final test at the end of the training course

Presentation of certificate

Prerequisites

- GMK 5.1 (EKS 4 & 5 Technology and Diagnostics)

Training Duration

- 4.5 Days
- From Sunday 8:00am to Thursday 12:30pm (trainer notification)

Training Capacity

- 6 Trainees

Dates

- 04.04.2021 – 08.04.2021
- 04.07.2021 – 08.07.2021
- 10.10.2021 – 14.10.2021

Cost

Training cost \$2,250.00*

*Training conducted in the UAE is subject to 5% VAT

REGISTRATION – PURCHASE ORDER

return to:

MANITOWOC CRANE GROUP FZE – Middle East Training Center

Jebel Ali Free Zone – P.O. Box: 261734 – Dubai, UAE

E-mail: kavungal.firoz@manitowoc.com / FAX: +971 (0)4 8862678/79

Date of Registration: _____

Course Name: _____

Course Date: _____

Course Location: **Dubai, United Arab Emirates** _____

Costs: _____

Company: _____

Contact: _____

Address: _____

Contact Phone: _____

Contact E-mail: _____

Invoice Recipient: _____

Purchase Number: _____

Participant(s): 1 _____

2 _____

3 _____

4 _____

5 _____

6 _____

Hotel Booking: _____

Flight Details: _____ Arrival : _____ Flight Number: _____

Transfer Needed? _____

Remark: **Please do NOT show up to class until you received confirmation of your attendance.**

ADDRESS & MAP

MANITOWOC CRANE GROUP ME FZE
MIDDLE EAST TRAINING CENTER

Jebel Ali Free Zone

P.O. Box: 261734

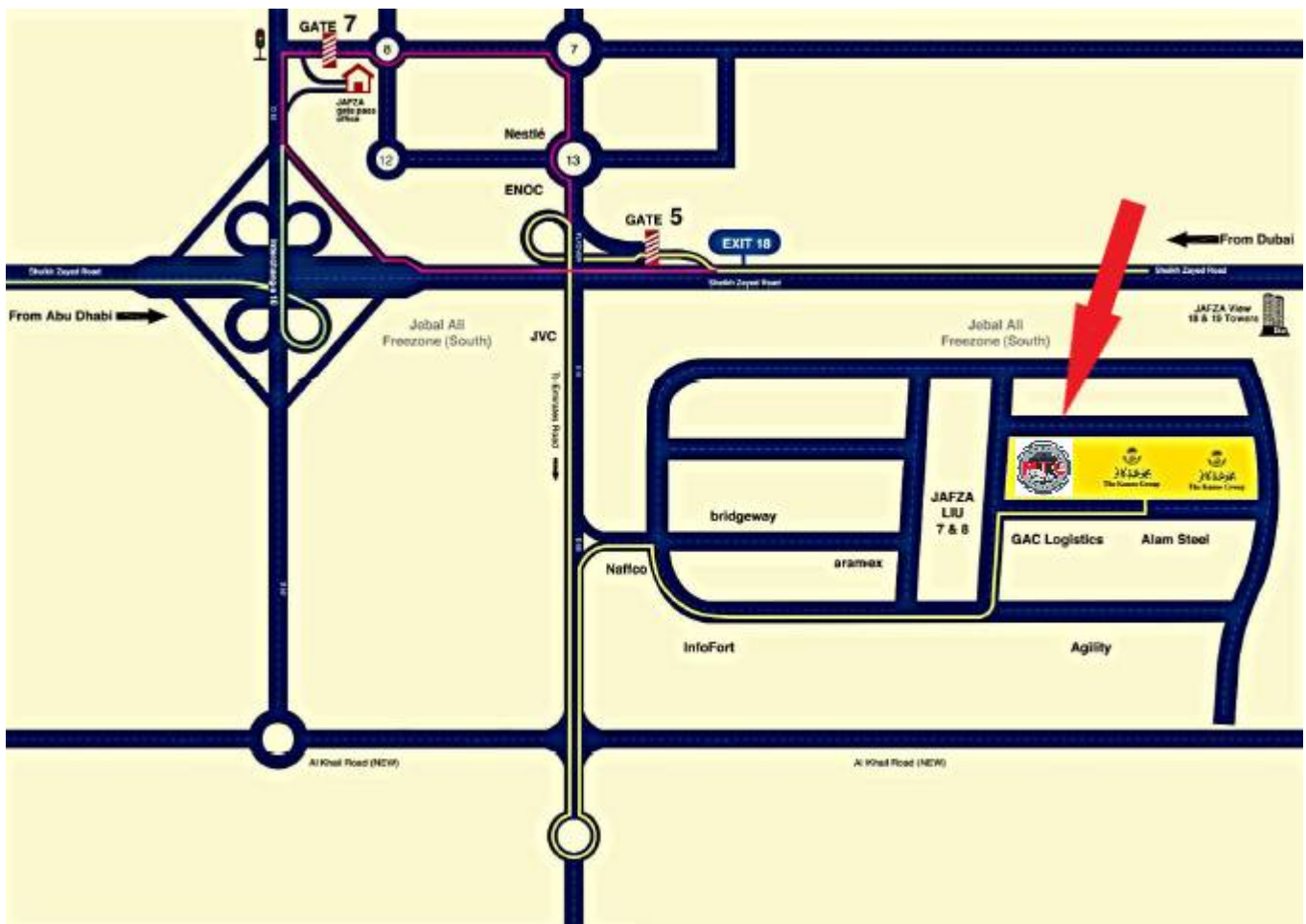
Dubai, United Arab Emirates

Phone: ++971 (0)4 8862677

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E-mail: kavungal.firoz@manitowoc.com

GPS: : 24°58'29.3"N 55°06'04.5"E



Manitowoc Cranes

Regional headquarters

Americas

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Greater Asia-Pacific

Singapore
Tel: +65 6264 1188
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Regional training center

Middle East Training Center

Jebel Ali, Dubai, UAE

P.O. Box: 261734

Tel: +971 (0)4 8862677

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Manitowoc Crane Care when you need it. The assurance of the world's most advanced crane service and support to get you back to work fast.



Manitowoc Finance helps you get right to work generating profits for your business. Financial tools that help you capitalize on opportunity with solutions that fit your needs.

This document is non-contractual. Constant improvement and engineering progress make it necessary that we reserve the right to make specification, equipment, and price changes without notice. Illustrations shown may include optional equipment and accessories and may not include all standard equipment.

Form No. 000000000

Part No. 0000

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