



MFE-IT

Reference: W/EN/MSQL

MySQL Training Course

Take Control of MySQL Database Management — From
Installation to Performance

Duration: 4 Days | Hours: 28 h

Remote · Sessions guaranteed from 1 registrant · 60% hands-on practice

DESCRIPTION

MySQL is one of the most widely used relational database engines in the world, powering everything from WordPress sites to large-scale enterprise applications. But to ensure its performance and security in a production environment, skilled administration is essential — default installations leave many doors open in terms of security, backup strategy and performance tuning.

This training course will teach you the skills you need to install, configure, monitor and secure your MySQL databases. You will learn how to manage users, automate backups, diagnose slowdowns and ensure the integrity of your data. The approach is hands-on throughout, with concrete scenarios you can replicate immediately in your own environment.

LEARNING OBJECTIVES

By the end of this training course, participants will be able to:

- Properly install and configure a MySQL server
- Manage databases, users, privileges and schemas
- Implement a reliable backup and restore strategy
- Optimise performance: queries, indexes, server configuration
- Diagnose and resolve common incidents
- Apply security best practices: encryption, audits, access control

PREREQUISITES

- Basic knowledge of Linux or Windows systems
- SQL concepts recommended (SELECT, INSERT, basic queries)
- No prerequisites in database administration required

Because each participant is unique, a personalised interview is systematically organised in advance with our expert to design a training programme perfectly aligned with their objectives, level and professional challenges.

TARGET AUDIENCE

System administrators, developers, integrators and IT professionals managing MySQL environments locally or in the cloud.

DETAILED PROGRAMME

The training alternates between theoretical input and hands-on practice (approximately 60% of the time). Modules are built around practical exercises based on real-world business use cases.

Module 1 – Introduction and MySQL Installation

- General operation and architecture
- Installation on Linux or Windows
- Initial configuration and post-install hardening

Module 2 – Database and User Management

- Creation of databases, tables and schemas
- Rights management, roles and accounts
- Best practices for naming and structure

Module 3 – Backups and Restores

- Manual and automated backups (mysqldump, scripts, third-party tools)
- Integrity checks and validation
- Crash recovery procedures

Module 4 – Performance and Tuning

- Slow query analysis and slow query log
- Indexes, EXPLAIN and query optimisation
- my.cnf configuration: cache, buffer pool, logs

Module 5 – Securing the MySQL Environment

- Network configuration and access protection
- Audits, updates and patching discipline
- Privilege hardening and encryption at rest / in transit

Module 6 – Monitoring and Troubleshooting

- Error logs, deadlocks and memory consumption
- Monitoring tools: MySQL Workbench, CLI, Prometheus exporters
- Common production incidents and resolution patterns

TEACHING METHODS

Format and Delivery

The training is delivered remotely via an interactive virtual classroom. It can also be delivered on-site, with content customised to match the needs of your professional project. The theory/practice split is approximately 40%/60%.

MFE-IT Ultra-Personalised Format

Each session accommodates between 1 and 3 participants, ensuring highly individualised support. A preliminary interview allows us to tailor the content to each participant's profile. Inter-company sessions are guaranteed from just 1 registrant (except in cases of force majeure).

Skills Assessment

Throughout the training, the trainer assesses participant progress through multiple-choice questions, role-playing exercises and hands-on work. At the end, a certificate of achievement is issued to each participant.

Post-Training Support

For one month following the training, each participant can contact MFE-IT trainers with questions about implementing acquired knowledge. A response is provided by email or telephone within 48 working hours.

Accessibility

MFE-IT is committed to welcoming people with disabilities. Contact: contact@mfe-it.com.

PRACTICAL INFORMATION

Trainer Resources

- Structured demonstrations aligned with the detailed programme
- Exercise briefs and solutions throughout the training
- A ready-to-use technical environment for practical workshops
- Trainer validation of acquired knowledge at the end of each workshop
- Digital reference documents

Certification and Validation

At the end of the training, a certificate is sent by email specifying the objectives, nature, duration and assessment results. A completion certificate can also be provided on request.

Benefits for Participants

- Train from your workplace or home, with no travel required
- Benefit from an expert trainer-consultant on the subject
- Enjoy an ultra-personalised format (1 to 3 participants)
- Continue training even in the event of unforeseen circumstances

Benefits for the Organisation

- Optimise the training budget by reducing travel and accommodation costs
- Offer quality training to all employees, regardless of location
- Reduce absence time linked to travel
- Support team upskilling in all contexts