

# Implement scalable database solutions using Azure SQL



## Training recipients

The training is intended for the specialists managing data and databases who would like to gain knowledge from administering data technologies available at Microsoft Azure platform. The training will also be helpful for data architects and application developers who would like to get to know data technologies available in Azure, and how these technologies might be used in applications. The training is also helpful for the people preparing for DP-300 exam



## Benefits

Knowledge and practical skills related to SQL Server database management, cloud infrastructure, in local resources and hybrid solutions, as well as working with relational database services as part of PaaS in Azure offer.

Furthermore, participants will be able to use the knowledge while developing applications which deliver the content of relational databases.



## Training program

1. The role of Azure database administrator
  - Roles as part of Azure data platform
  - Azure database options and mechanisms
  - SQL Server compatibility levels
  - Azure new functions
2. Planning and implementing data platform's resources
  - Implementing SQL Server using IaaS services

- Implementing SQL Server using PaaS services
- Implementing opensource database solutions in Azure
- 3. Implementing safe environment
  - Configuring authentication to Databases
  - Configuring authorisation to Databases
  - Securing stored data
  - Securing data transfer
  - Implementing compatibility control for sensitive personal data
- 4. Monitoring and optimising operational resources
  - Points of reference and monitoring performance
  - Main reasons for decrease in performance
  - Configuring resources for optimal performance
  - Configuring databases
  - Maintenance tasks related to performance
- 5. Task performance optimisation
  - Understanding SQL Server query plans
  - Getting to know database development in terms of performance
  - Improvements in terms of performance based on evaluation
- 6. Task automation
  - Setting automatic implementation
  - Defining task schedules
  - Configuring Extended Events
  - Azure PaaS resource management using automation methods
- 7. Planning and implementing high availability and recovery environments
  - Strategies of High Availability and Recovery (HADR)
  - IaaS services and database tools for HADR
  - PaaS services and database tools for HADR
  - Database back-ups and recovery



## Expected preparation of the participant

Experience in database management.

Knowledge of cloud technologies.

Basic knowledge of Microsoft Windows operational system and its key functions.

An ability to use English language materials



## Training Includes

\* **podręcznik** w formie elektronicznej dostępny na platformie:

<https://learn.microsoft.com/pl-pl/training/>



## Language

- Training: English
- Materials: English

## Duration

4 days / 28 hours

## Examination method

**Egzamin** w formie **on-line**. Zapis na stronie <https://home.pearsonvue.com/Clients/Microsoft.aspx>