

DP-300T00: Administering Microsoft Azure SQL Solutions

Category: AI, Data & Analytics | **Vendor:** Microsoft

Duration: 32.00 hours (4 days) **26.0 CPD Hours**

Rating: ★ 4.6 (5,878 reviews)

Course Information

Delivery Format:	Instructor Led - Online
Certification:	Microsoft Certified: Azure Database Administrator Associate
Related Exam:	DP-300

Course Overview

This course provides students with the knowledge and skills to administer a SQL Server database infrastructure for cloud, on-premises and hybrid relational databases and who work with the Microsoft PaaS relational database offerings. Additionally, it will be of use to individuals who develop applications that deliver content from SQL-based relational databases.

About This Course

This course provides students with the knowledge and skills to administer a SQL Server database infrastructure for cloud, on-premises and hybrid relational databases and who work with the Microsoft PaaS relational database offerings. Additionally, it will be of use to individuals who develop applications that deliver content from SQL-based relational databases.

Who Should Attend

The audience for this course is data professionals managing data and databases who want to learn about administering the data platform technologies that are available on Microsoft Azure. This course is also valuable for data architects and application developers who need to understand what technologies are available for the data platform with Azure and how to work with those technologies through applications.

Prerequisites & Entry Requirements

General Prerequisites:

In addition to their professional experience, students who take this training should have technical knowledge equivalent to the following courses:

- [AZ-900T00 Microsoft Azure Fundamentals](#)
- [DP-900T00 Microsoft Azure Data Fundamentals](#)

Learning Outcomes

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

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

[illegible]

performance and tune a database and queries for optimum performancePlan and configure a High Availability Solution.

Detailed Course Outline

1 - Prepare to maintain SQL databases on Azure

- Describe Microsoft Intelligent Data Platform roles
- Understand SQL Server in an Azure virtual machine
- Design Azure SQL Database for cloud-native applications
- Explore Azure SQL Database Managed Instance

2 - Deploy IaaS solutions with Azure SQL

- Explain IaaS options to deploy SQL Server in Azure
- Understand hybrid scenarios
- Explore performance and security
- Explain high availability and disaster recovery options

3 - Deploy PaaS solutions with Azure SQL

- Explain PaaS options for deploying SQL Server in Azure
- Explore single SQL database
- Deploy SQL database elastic pool
- Understand SQL database hyperscale
- Examine SQL managed instance
- Describe SQL Edge

4 - Evaluate strategies for migrating to Azure SQL

- Understand compatibility level
- Understand Azure preview features
- Describe Azure database migration options

5 - Migrate SQL workloads to Azure SQL databases

- Choose the right SQL Server Instance option in Azure
- Migrate SQL Server to Azure SQL Database offline
- Migrate SQL Server to Azure SQL Database online
- Load and move data to Azure SQL Database

6 - Migrate SQL workloads to Azure Managed Instances

- Evaluate migration scenarios to SQL Database Managed Instance
- Migrate to SQL Database Managed Instance
- Load and Move data to SQL Database Managed Instance

7 - Configure database authentication and authorization

- Describe Active Directory and Azure Active Directory
- Describe authentication and identities
- Describe Security Principals
- Describe database and object permissions
- Identify authentication and authorization failures

8 - Protect data in-transit and at rest

- Explore Transparent Data Encryption
- Configure server and database firewall rules
- Explain object encryption and secure enclaves
- Enable encrypted connections
- Describe SQL injection
- Understand Azure Key Vault

9 - Implement compliance controls for sensitive data

- Explore data classification
- Explore server and database audit
- Implement Dynamic Data Masking
- Implement Row Level security
- Understand Microsoft Defender for SQL
- Explore Azure SQL Database Ledger
- Implement Azure Purview

10 - Describe performance monitoring

- Describe performance monitoring tools
- Describe critical performance metrics
- Establish baseline metrics
- Explore extended events
- Describe Azure SQL Insights
- Explore Query Performance Insight

11 - Configure SQL Server resources for optimal performance

- Explain how to optimize Azure storage for SQL Server virtual machines
- Describe virtual machine resizing
- Optimize database storage
- Control SQL Server resources

12 - Configure databases for optimal performance

- Explore database maintenance checks
- Describe database scoped configuration options
- Describe automatic tuning
- Describe intelligent query processing

13 - Explore query performance optimization

- Understand query plans
- Explain estimated and actual query plans
- Describe dynamic management views and functions
- Explore Query Store
- Identify problematic query plans
- Describe blocking and locking

14 - Evaluate performance improvements

- Describe wait statistics
- Tune and maintain indexes
- Understand query hints

15 - Explore performance-based design

- Describe normalization
- Choose appropriate data types
- Design indexes

16 - Automate deployment of database resources

- Describe deployment models in Azure
- Automate deployment by using Azure Resource Manager templates and Bicep
- Automate deployment by using PowerShell
- Automate deployment by using Azure CLI

17 - Create and manage SQL Agent jobs

- Create a SQL Server maintenance plan
- Describe task status notifications

18 - Manage Azure PaaS tasks using automation

- Explore Elastic jobs
- Understand Azure Automation
- Build an automation runbook
- Automate database workflows by using Logic Apps
- Monitor automated tasks

19 - Describe high availability and disaster recovery strategies

- Describe recovery time objective and recovery point objective
- Explore high availability and disaster recovery options
- Describe Azure high availability and disaster recovery features for Azure Virtual Machines
- Describe high availability and disaster recovery options for PaaS deployments
- Explore an IaaS high availability and disaster recovery solution
- Describe hybrid solutions

20 - Explore IaaS and PaaS solutions for high availability and disaster recovery

- Describe failover clusters in Windows Server
- Configure Always-on availability groups
- Describe temporal tables in Azure SQL Database
- Describe active geo-replication for Azure SQL Database
- Explore auto-failover groups for Azure SQL Database and Azure SQL Managed Instance

21 - Back up and restore databases

- Back up and restore SQL Server running on Azure virtual machines
- Back up a SQL Server virtual machine
- Back up and restore a database using Azure SQL Database

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1 - Prepare to maintain SQL Server-based databases on Azure

- Describe Microsoft Intelligent Data Platform roles
- Understand SQL Server in an Azure virtual machine
- Design Azure SQL Database for cloud-native applications
- Explore Azure SQL Managed Instance
- Module assessment

2 - Deploy IaaS solutions with Azure SQL

- Explain IaaS options to deploy SQL Server in Azure
- Understand hybrid scenarios
- Explore performance and security
- Explain high availability and disaster recovery options
- Module assessment

3 - Deploy PaaS solutions with Azure SQL

- Explain PaaS options for deploying SQL Server in Azure
- Explore single SQL database
- Deploy SQL database elastic pool
- Understand SQL database hyperscale
- Examine SQL managed instance
- Module assessment

4 - Migrate SQL Server workloads to Azure SQL Database

- Choose the right Azure SQL Database feature
- Use Azure SQL migration extension to migrate to Azure SQL Database
- Migrate to Azure SQL Database using BACPAC
- Use an online method to migrate to Azure SQL Database
- Move data to Azure SQL Database
- Module assessment

5 - Migrate SQL Server workloads to Azure SQL Managed Instance

- Evaluate migration scenarios
- Use Log Replay Service (LRS) to migrate
- Migrate using Managed Instance link
- Move data to SQL Managed Instance
- Module assessment

6 - Configure database authentication and authorization

- Describe authentication and identities
- Describe Security Principals
- Describe database and object permissions
- Identify authentication and authorization failures
- Module assessment

7 - Protect data in-transit and at rest

- Explore Transparent Data Encryption
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- Implement Dynamic Data Masking
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- Understand Microsoft Defender for SQL
- Explore Ledger
- Implement Microsoft Purview
- Module assessment

9 - Describe performance monitoring

- Describe performance monitoring tools
- Describe critical performance metrics
- Establish baseline metrics
- Explore extended events
- Describe database watcher (preview)
- Explore Query Performance Insight
- Module assessment

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- Explain how to optimize Azure storage for SQL Server virtual machines
- Describe virtual machine resizing
- Optimize database storage
- Control SQL Server resources
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- Describe hybrid solutions
- Module assessment

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- Describe active geo-replication for Azure SQL Database
- Explore auto-failover groups for Azure SQL Database and Azure SQL Managed Instance
- Monitor availability
- Module assessment

20 - Back up and restore databases

- Back up and restore SQL Server running on Azure virtual machines
- Back up a SQL Server virtual machine
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- Module assessment

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authentication and authorization, Protect data in transit and at rest, Configure SQL Server resources for optimal performance, Describe performance monitoring, Implement compliance controls for sensitive data, Describe high availability and disaster recovery strategies, Explore IaaS and PaaS solutions for high availability and disaster recovery, Back up and restore databases, Create and manage SQL Agent jobs, Manage Azure PaaS tasks using automation, Explore performance-based design, Automate deployment of database resources, Evaluate performance improvements, Explore query performance optimization, Configure databases for optimal performance, Plan and implement data platform resources, Implement a secure environment for a database service, Monitor and optimize operational resources in Azure SQL, Optimize query performance in Azure SQL, Automate database tasks for Azure SQL, Plan and implement a high availability and disaster recovery environment, Introduction to Azure database administration, LAB Outline

Certification Path

Microsoft Certified: Azure Database Administrator Associate

Exam: DP-300

Upcoming Schedule

Available training dates for DP-300T00: Administering Microsoft Azure SQL Solutions:

Start Date	End Date	Location	Delivery	Price
15 Sep 2026	18 Sep 2026	Online	Virtual	€2,495.00
17 Nov 2026	20 Nov 2026	Online	Virtual	€2,495.00
19 Jan 2027	22 Jan 2027	Online	Virtual	€2,495.00

Additional Course Details

Nexus Humans DP-300 Administering Microsoft Azure SQL Solutions training program is a workshop that presents an invigorating mix of sessions, lessons, and masterclasses meticulously crafted to propel your learning expedition forward.

This immersive bootcamp-style experience boasts interactive lectures, hands-on labs, and collaborative hackathons, all strategically designed to fortify fundamental concepts.

Guided by seasoned coaches, each session offers priceless insights and practical skills crucial for honing your expertise. Whether you're stepping into the realm of professional skills or a seasoned professional, this comprehensive course ensures you're equipped with the knowledge and prowess necessary for success.

While we feel this is the best course for the DP-300 Administering Microsoft Azure SQL Solutions course and one of our Top 10 we encourage you to read the course outline to make sure it is the right content for you.

Additionally, private sessions, closed classes or dedicated events are available both live online and at our training centres in Dublin and London, as well as at your offices anywhere in the UK, Ireland or across EMEA.

Frequently Asked Questions

Q: What delivery options are available for DP-300T00: Administering Microsoft Azure SQL Solutions?

We offer multiple delivery formats:

- Live Instructor-Led Classroom Online (Virtual/Live Online)
 - Traditional Instructor-Led Classroom Training (ILT)
 - On-site delivery at your offices anywhere in United Kingdom
 - Private dedicated courses customized for your team
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Q: What certification does this course prepare me for?

The DP-300T00: Administering Microsoft Azure SQL Solutions course helps prepare you for the Microsoft Certified: Azure Database Administrator Associate certification path.

Q: Which exam does this course prepare me for?

This course prepares you for the DP-300 official exam. You can take this exam at any exam center across United Kingdom including London, Manchester, Birmingham, Edinburgh, or live online wherever you are located.

Q: How many CPD hours does this course provide?

The 4-day DP-300T00: Administering Microsoft Azure SQL Solutions course provides up to 26.0 CPD hours of structured learning. CPD certificates can be provided upon request.

Q: What is the duration of the DP-300T00: Administering Microsoft Azure SQL Solutions training?

The training takes place over 4 day(s), with each day lasting approximately 32.00 hours including breaks for lunch and refreshments.

Q: Do you provide corporate training for DP-300T00: Administering Microsoft Azure SQL Solutions?

Yes, we provide corporate training, dedicated training, and closed classes for DP-300T00: Administering Microsoft Azure SQL Solutions. Training can take place anywhere in United Kingdom including London, Manchester, Birmingham, Edinburgh, or live online allowing teams from across United Kingdom or internationally to attend.

Q: What related terms do people search for?

Popular related searches include: dp300 dp 300, DP-300T00: Implement scalable database solutions using Azure SQL, Microsoft, vILT, DP-300T00

Q: Why choose Nexus Human for DP-300T00: Administering Microsoft Azure SQL Solutions?

Nexus Human is recognized as one of the leading training providers. Our trainers have won multiple awards including:

- Small Firms Best Trainer Award
 - National Training Partner of the Year (Ireland) - Multiple Years
 - Global Top 30 Instructor Awards (2012, 2019, 2021)
 - Tech Excellence Award Nominations
 - Learning Performance Institute (LPI) External Training Provider Sponsor 2024
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Q: Are there any discount codes available?

Yes! Use discount code **PENPAL5** when booking your DP-300T00: Administering Microsoft Azure SQL Solutions training. Please note that only one discount code can be used per booking and cannot be combined with other special offers.

Nexus Human

Professional Training & Development

✉ Email: info@nexushuman.com

🌐 Website: www.nexushuman.com

📞 Phone: +353 1 XXX XXXX (Ireland) | +44 20 XXXX XXXX (UK)

