Section 4: Integrating with Azure managed services

So far in the book, you have run multiple applications on top of **Azure Kubernetes Service (AKS)**. The applications were always self-contained, meaning the full application was able to run in its entirety on top of AKS. There are certain advantages of running a full application on top of AKS. You gain application portability since you can move that application to any other Kubernetes cluster with little friction. You also have full control over the end-to-end application.

With great control comes great responsibility. There are certain advantages to offloading parts of your application to one of the PaaS services that Azure offers. For example, by offloading your database to a managed PaaS service, you no longer need to take care of updating the database service, backups are automatically per-

formed for you, and a lot of logging and monitoring is done out of the box.

In the coming chapters, you will learn more about multiple advanced integrations and the advantages that come with them. Having read this section, you should be able to securely access other Azure services, such as Azure SQL Database and Azure Functions, and perform **continuous integration and continuous delivery** (**CI/CD**) using GitHub Actions.

This section contains the following chapters:

- *Chapter 12, Connecting an application to an Azure database*
- *Chapter 13, Azure Security Center for Kubernetes*
- *Chapter 14, Serverless functions*
- *Chapter 15, Continuous integration and continuous deployment for AKS*

You will start this section with *Chapter 12, Connecting an application to an Azure data-*

base, in which you will connect an application to Azure Database for MySQL.