

# Hard Drives

Hard drives store data permanently on devices unless the data is deleted or overwritten. But, data storage is not temporary on hard drives like on RAM. One type of hard drive in use is a magnetic hard drive, or hard disk drive (HDD). Data is stored in fragments on magnetic disk sectors on these hard drives.

Though many devices use HDDs, many newer devices now store data on solid-state drives (SSDs). Still, technicians need to know how to support HDDs as they are still in use on many devices.

## Purpose

Upon completing this project, you will better understand the characteristics of magnetic hard drives.

## Steps for Completion

1. What are the four speeds in RPMs typically found on magnetic hard drives?
  - a. \_\_\_\_\_
  - b. \_\_\_\_\_
  - c. \_\_\_\_\_
  - d. \_\_\_\_\_
2. What are the two typical sizes for HDDs, and in what devices are those sizes usually found?
  - a. \_\_\_\_\_
  - b. \_\_\_\_\_
3. What is one advantage of HDDs over SSDs?
  - a. \_\_\_\_\_

## Project Details

### Project file

N/A

### Estimated completion time

5 minutes

### Video reference

#### Domain 3

**Topic:** Hard Drives

**Subtopics:** Speeds; HDD Form Factors; Communication Interfaces; SSD Form Factors

### Objectives covered

#### 3 Hardware

**3.3** Given a scenario, select and install storage devices

##### 3.3.1 Hard drives

##### 3.3.1.1 Speeds

**3.3.1.1.1** 5,400 rpm

**3.3.1.1.2** 7,200 rpm

**3.3.1.1.3** 10,000 rpm

**3.3.1.1.4** 15,000 rpm

##### 3.3.1.2 Form factor

**3.3.1.2.1** 2.5

**3.3.1.2.2** 3.5