



# A New Era of High Capacity Flash Storage

## SDHC Card



Break through the storage barrier with next generation Apacer SD High Capacity (SDHC™) flash cards. Today's newest high-resolution cameras, camcorders and multimedia devices require faster, higher capacity flash memory. Apacer SDHC flash cards, based on the SD Card Association Version 2.0 specification, deliver an amazing 8GB storage (for Class 2) and fast write speeds (6MB/sec for Class 6) these devices need, all in an incredibly small SD card. FAT32 file system support drives this increased storage capacity. SDHC offers ECC error correction and detection, Content Protection for Recordable Media (CPRM) and Wear Leveling technology to extend product life. A product lifetime warranty and RoHS compliance make these SDHC flash cards ready to support your cutting-edge digital lifestyle.

### What is SDHC?

The SDHC card is based on the SD Specification Version 2.0 introduced by the SD Card Association in early of 2006. It utilizes a FAT 32 (vs. FAT 16 for SD) file system that lets SD cards increase capacities up to 4GB and above.

The SD specification versions have been updated as follows:

- SD Spec Ver 1.0: The highest read speed rate is 12.5MB/sec (approx. 85x speed)
- SD Spec Ver 1.1: The highest read speed rate is 25MB/sec (approx. 170x speed)
- SD Spec Ver 2.0 (SDHC with FAT 32 file system): Capacities up to 32GB

Compared to SD Spec Ver 1.0, Spec Ver 1.1's speed improved significantly. In SD Spec Ver 2.0, it brings another breakthrough in capacity, with a highest capacity of 32GB possible. For its' write speed, the SD Card Association also defines 3 speed classes. They are Class 2, 4 and 6.

### What's the class speed rating?

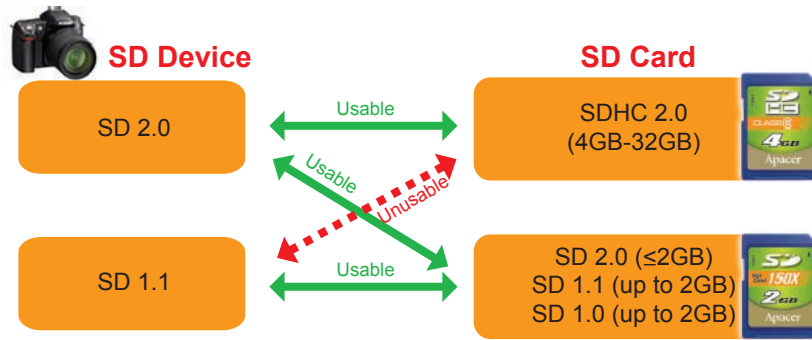
SDA has created and defined speed classes to identify speed and performance of SDHC cards and devices.



The SDHC speed class ratings are based on minimum write speed, users can look at the speed class logo to know the performance level.

- Class 2: Greater than or equal to 2MB/sec write speed
- Class 4: Greater than or equal to 4MB/sec write speed
- Class 6: Greater than or equal to 6MB/sec write speed

## Compatibility with SDHC



SDHC Flash card (≥4GB) are only compliant with SDHC devices. Some SD 1.01/1.1 host devices can upgrade firmware so the device can support the SDHC card.

## Specification

High Speed



### SDHC(SD High Capacity) Class 6 Card

- Compliant with latest SD Spec Ver 2.0
- **Extreme transfer rate for fast copying and downloading**
- **Speed Class: Class 6 (6 MB/sec minimum performance)**
- Support CPRM technology
- Support ECC function to detect and correct errors
- Wear Leveling function to extend lifetime
- Support ISP mode to load the firmware
- Mechanical write protection switch
- Auto Stand-by and Sleep Mode
- RoHS compliant
- Product lifetime warranty
- Capacity: 4GB

Large Capacity



### SDHC(SD High Capacity) Class 2 Card

- Compliant with latest SD Spec Ver 2.0
- **Large storage capacity up to 8GB**
- High transfer rate for fast copying and downloading
- **Speed Class: Class 2 (2 MB/sec minimum performance)**
- Support CPRM technology
- Support ECC function to detect and correct errors
- Wear Leveling function to extend lifetime
- Support ISP mode to load the firmware
- Mechanical write protection switch
- Auto Stand-by and Sleep Mode
- RoHS compliant
- Product lifetime warranty
- Capacity: 4GB /8GB

Best partner for Mobile



### miniSDHC(miniSD High Capacity) Class 2 Card

- About 40% the size of an SD card
- Compliant with latest SD Spec Ver 2.0
- **High transfer rate for fast copying and downloading**
- **Speed Class: Class 2 (2 MB/sec minimum performance)**
- Support CPRM technology
- Support ECC function to detect and correct errors
- Wear Leveling function to extend lifetime
- Support ISP mode to load the firmware
- Mechanical write protection switch
- Auto stand-by and Sleep Mode
- All miniSDHC cards are bundled with an SD adapter
- RoHS compliant
- Product lifetime warranty
- Capacity: 4GB

## Storage Chart

Flash Card Capacity	4GB	8GB
Photos (6MP)*	2432	4864
Photos (7MP)*	2162	4324
Photos (8MP)*	1946	3891
Photos (9MP)*	1853	3706
Photos (10MP)*	1769	3537
Photos (12MP)*	1556	3113
Photos (16MP)*	1297	2594
MPEG-2 Video**	1 hr 43min	3hr
MPEG-4 Video***	23hr	47hr
Music (SD-audio/AAC)****	1024 songs	2058 songs

(MP=Megapixels, MB=Megabytes, GB= Gigabytes)

### Notices:

- \*The number of images are based on JPEG format image; this may vary depending on the camera model and settings.
- \*\*The minutes of video are based on 704 x 480 pixels, 5 Mbps, 30 fps; this may vary depending on the compression rate and the device.
- \*\*\* The minutes of video are based on QVGA (320 x 240 pixels), 384 kbps, 15 fps; this may vary depending on the compression rate and the device.
- \*\*\*\*The number of songs are based on 4MB file size; this may vary depending on the compression rate and the device.
- The actual available memory on the device is less than what is listed on the package. This is due to small discrepancies in file formats and algorithms used by various operating systems. In addition, a portion of memory space is reserved for system files and data sectors for better performance.
- Look for the SDHC logo on the product or packaging of your device, or contact your device manufacturer for details on SDHC card support. Some SD 1.01/1.1 host devices can upgrade firmware so the device can support the SDHC card.

## Global Presence

### Taiwan (Headquarters)

Apacer Technology Inc.  
Tel:+886-2-2696-1666  
Fax:+886-2-2696-1668

### China

Apacer Electronic(Shanghai) CO., Ltd  
Tel:+86-21-5206-6933  
Fax:+86-21-5206-6939

### Europe

Apacer Technology B.V.  
Tel:+31-73-645-9620  
Fax:+31-73-645-9629

### Japan

アペイサーテクノロジー株式会社  
Tel:+81-3-5817-3496  
Fax:+81-3-5817-3497

### U.S.A.

Apacer Memory America, Inc.  
Tel:+1-408-232-1291  
Fax:+1-408-432-6019

**Apacer**  
Access the best