

# Type

## Product Type

SSD

## Usage Application

Client PCs

# Application

## Consumer

Yes

# Storage

## Capacity

250GB (1GB=1 Billion byte by IDEMA) \* Actual usable capacity may be less (due to formatting, partitioning, operating system, applications or otherwise)

# Key Features

## Sequential Read Speed

Up to 3,500 MB/s \* Performance may vary based on system hardware & configuration

## Random Read Speed

Random Read (4KB, QD32): Up to 250,000 IOPS; Random Read (4KB, QD1): Up to 17,000 IOPS \* Performance may vary based on system hardware & configuration

## Controller

Samsung Phoenix Controller

## Cache Memory

Samsung 512MB Low Power DDR4 SDRAM

## AES Encryption

AES 256-bit Encryption (Class 0)TCG/Opal IEEE1667 (Encrypted drive)

## GC (Garbage Collection)

Auto Garbage Collection Algorithm

## Device Sleep Mode Support

Yes

## NVMe

Yes

# General

**Average Power Consumption (system level)**

## Series

970 EVO Plus

## Interface

PCIe Gen 3.0 x 4, NVMe 1.3

## Sequential Write Speed

Up to 2,300 MB/s \* Performance may vary based on system hardware & configuration

## Random Write Speed

Random Write (4KB, QD32): Up to 550,000 IOPS; Random Write (4KB, QD1): Up to 60,000 IOPS \* Performance may vary based on system hardware & configuration

## NAND Flash

Samsung V-NAND 3-bit MLC

## Trim Support

Supported

## S.M.A.R.T. Support

Supported

## WWN Support

Not supported

## Temperature proof

Yes

## Gaming SSDs

Yes

**Power consumption (Idle)**

\* Average: 5 W \* Maximum: 8 W (Burst mode) \* Actual power consumption may vary depending on system hardware & configuration

#### **Voltage**

3.3 V  $\pm$  5 % Allowable voltage

## **Environmental Specs**

#### **Operating Temperature**

0 - 70 °C Operating Temperature

## **Form Factor**

#### **Product**

M.2 (2280)

## **Dimensions (W x H x D)**

#### **Product**

80.15 x 22.15 x 2.38 (mm)

## **Weight**

#### **Product**

Max 8.0 g Weight

## **Software**

#### **Management SW**

Magician Software for SSD management

## **Warranty**

#### **Product**

5-Year Limited Warranty or: 150 TBW Limited Warranty

Max. 30 mW \* Actual power consumption may vary depending on system hardware & configuration

#### **Reliability (MTBF)**

1.5 Million Hours Reliability (MTBF)

#### **Shock**

1,500 G & 0.5 ms (Half sine)