

[Network](#) / NWPath

Structure

NWPath

An object that contains information about the properties of the network that a connection uses, or that are available to your app.

iOS 12.0+ | iPadOS 12.0+ | Mac Catalyst 12.0+ | macOS 10.14+ | tvOS 12.0+ | visionOS 1.0+ | watchOS 5.0+

```
struct NWPath
```

Topics

Checking Path Availability

```
let status: NWPath.Status
```

A status indicating whether a path can be used by connections.

```
enum Status
```

Status values indicating whether a path can be used by connections.

Inspecting Interfaces

```
func usesInterfaceType(NWInterface.InterfaceType) -> Bool
```

Checks if connections using the path may send traffic over a specific interface type.

```
let availableInterfaces: [NWInterface]
```

A list of all interfaces available to the path, in order of preference.

```
var gateways: [NWEndpoint]
```

A list of gateways configured on the interfaces available to a path.

Checking Path Capabilities

`let supportsIPv4: Bool`

A Boolean indicating whether the path can route IPv4 traffic.

`let supportsIPv6: Bool`

A Boolean indicating whether the path can route IPv6 traffic.

`let supportsDNS: Bool`

A Boolean indicating whether the path has a DNS server configured.

`var isConstrained: Bool`

A Boolean indicating whether the path uses an interface in Low Data Mode.

`let isExpensive: Bool`

A Boolean indicating whether the path uses an interface that is considered expensive, such as Cellular or a Personal Hotspot.

Inspecting Connected Paths

`let localEndpoint: NWEndpoint?`

The local endpoint in use by a connection's network path.

`let remoteEndpoint: NWEndpoint?`

The remote endpoint in use by a connection's network path.

Instance Properties

`var isUltraConstrained: Bool`

Checks if the path uses an NWInterface that is considered to be constrained by user preference

`var linkQuality: NWPath.LinkQuality`

Represents the link quality measurement of the link layer network attachment

`var unsatisfiedReason: NWPath.UnsatisfiedReason`

`var wifiAware: WAPath?`

Current status and performance information for Wi-Fi Aware, or `nil` if this path is not over Wi-Fi Aware.

Enumerations

```
enum LinkQuality
    Represents the link quality measurement of the link layer network attachment

enum UnsatisfiedReason
```

Relationships

Conforms To

```
CustomDebugStringConvertible
Equatable
Sendable
SendableMetatype
```

See Also

Paths and Interfaces

```
class NWPathMonitor
    An observer that you use to monitor and react to network changes.

struct NWInterface
    An interface that a network connection uses to send and receive data.
```