

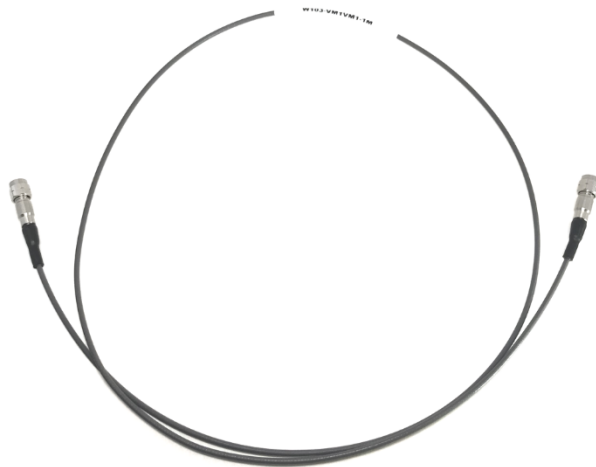
**W1 Series** are complete line of high performance flexible microwave cable assemblies.

**The W103 Series** have **Low density PTFE dielectric** structure and achieve fast velocity propagation of **81 %**.

W103 series have excellent RF performance up to 40, 50 GHz & 67 GHz with 2.92 mm, 2.4 mm & 1.85 mm connectors, respectively.

## ■ Features

- Center Conductor : Silver Plated Copper
- Dielectric core : LD PTFE
- Outer Conductor : Silver Plated Copper Ribbon
- Outer Shield : Silver Plated Copper



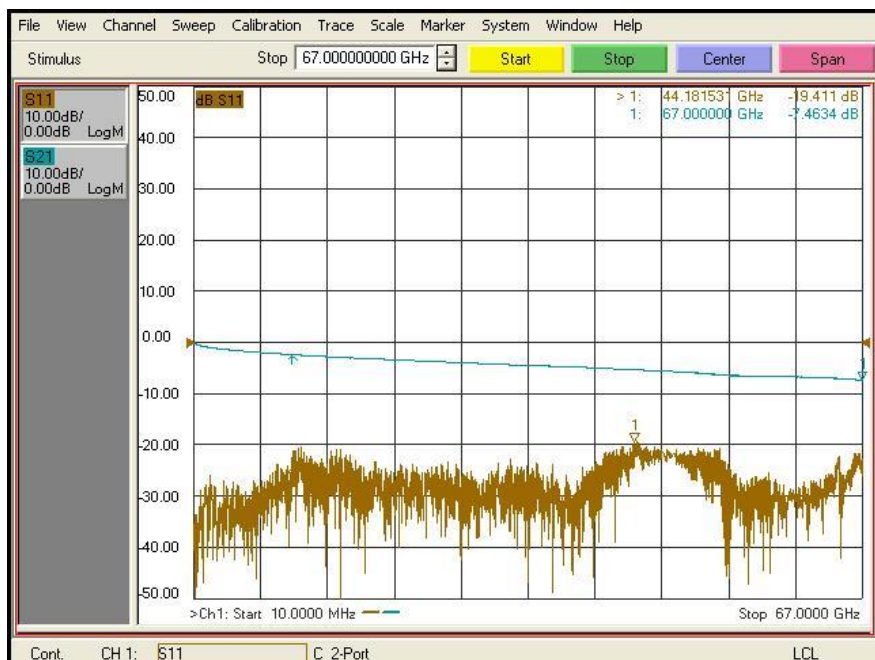
## ■ Specification

| Scope                      | Specification               | W103 (40,50 & 67 GHz)              |
|----------------------------|-----------------------------|------------------------------------|
| Physical                   | Center Conductor (mm)       | 0.51                               |
|                            | Dielectric (mm)             | 1.38                               |
|                            | Outer Conductor (mm)        | 1.58                               |
|                            | Outer Shield (mm)           | 1.90                               |
|                            | Jacket (mm)                 | 2.20                               |
| Electrical                 | Impedance(Ohm)              | 50                                 |
|                            | Operation Freq.(GHz)        | 40,50 & 67 GHz                     |
|                            | Velocity of Propagation(%)  | 81                                 |
|                            | Shielding Effectiveness(dB) | <- 90                              |
|                            | VSWR                        | < 1.3                              |
|                            | Amplitude Stability (dB)    | < ± 0.05 (up to 67 GHz)            |
|                            | Phase Stability             | < ± 4 (up to 67 GHz)               |
| Mechanical & Environmental | Weight (g/M)                | 16                                 |
|                            | Bending Radius mm)          | 11 (Installation)<br>22 (Repeated) |
|                            | Temperature                 | -55 ~+165°C                        |

## ■ Test Result

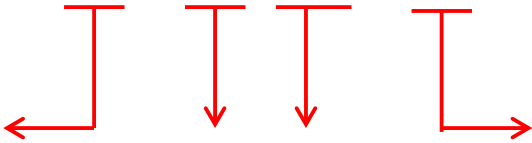
### Part No: W103-VM1VM1-1M

- Frequency : DC to 67 GHz
- Connector : 1.85 mm (Male)
- Cable Length : 1 meter



■ **Selection Guide**

**W103 – VM1VM1 – 1M**



**Cable Type**

W103

**Connector Type**

KM1: 2.92 mm Male  
KF1 : 2.92 mm Female  
2M1: 2.4 mm Male  
2F1 : 2.4 mm Female  
VM1: 1.85 mm Male  
VF1 : 1.85 mm Female

**Cable Length**

Unit : Meter



■ *Revision History*

| Revision | Date       | Changes                             |
|----------|------------|-------------------------------------|
| Ver 1.0  | 2019-08-01 | Released W103 Series Cable Assembly |