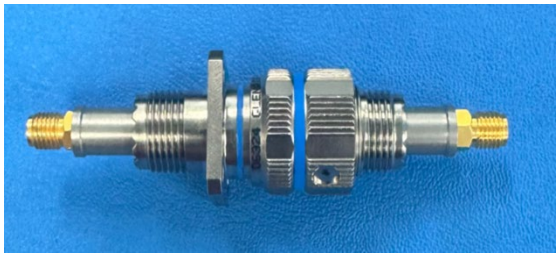
GT-24-121

COAX CONTACT, G-LINK, BMB to SMA,

SIZE 8, 50 OHMS

852-157, 852-158, and 852-256

RF Signal Integrity Report



Revision History

Rev	Date	Issued	Approved	Description
1	6/27/2024	L. Blackwell / W. Lewis	G. Hunziker	Initial Release
2	6/5/2025	L. Blackwell	G. Hunziker	Updated format

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1. Introduction

This document contains results from testing that was performed to evaluate the high-frequency electrical performance of the Glenair G-Link Size 8 BMB to SMA contacts designed for SuperNine, 806RF, and 795 series connectors. G-Link contacts were tested in a mated pair of SuperNine connectors with a ground-plane insert and a mated pair of 806RF connectors. This report outlines the frequency domain performances of Insertion Loss (IL), and Voltage Standing Wave Ratio (VSWR).

2. Test Information

2.1.Test Samples

The test samples consisted of the BMB to SMA pin contact 852-157, and the BMB to SMA socket contacts 852-158 and 852-256. These contacts are shown in Figure 1 and Figure 2.

Figure 1. 852-157 and 852-158 Test Contact Samples (SuperNine Style)

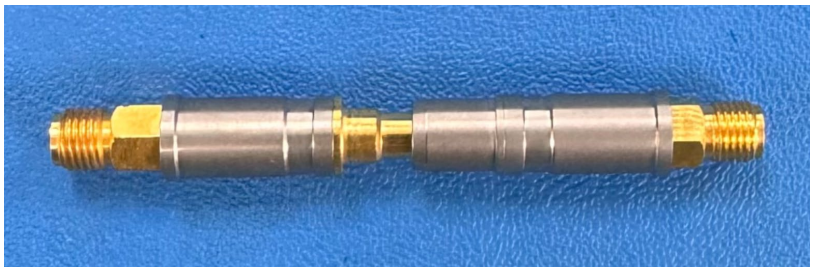

Figure 2. 852-157 and 852-256 Test Contact Samples (806RF/795 Style)

Contacts 852-157 and 852-158 were installed in a mated pair of 233-217 SuperNine circular connectors with a ground plane insert. Contacts 852-157 and 852-256 were installed in a mated pair of 806-072 Plug and 806-073 Receptacle 806RF circular connectors. The assembled, mated samples are shown in Figure 3 and Figure 4.

Figure 3. SuperNine Mated Connection

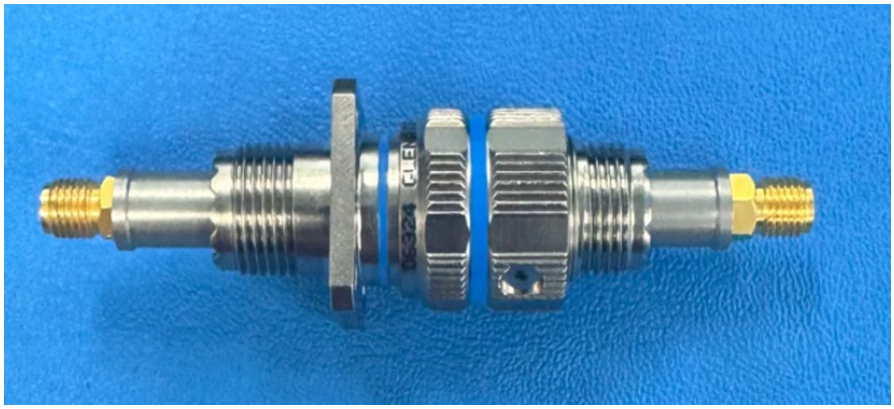

Figure 4. 806RF Mated Connection

2.2.Test Setup

Measurements were taken using an Anritsu MS46524B Vector Network Analyzer. No test fixturing was required as the test samples are directly connected to the test equipment. The test data was saved in a touchstone (.s2p) format.

3. Test Results

3.1.1. Insertion Loss

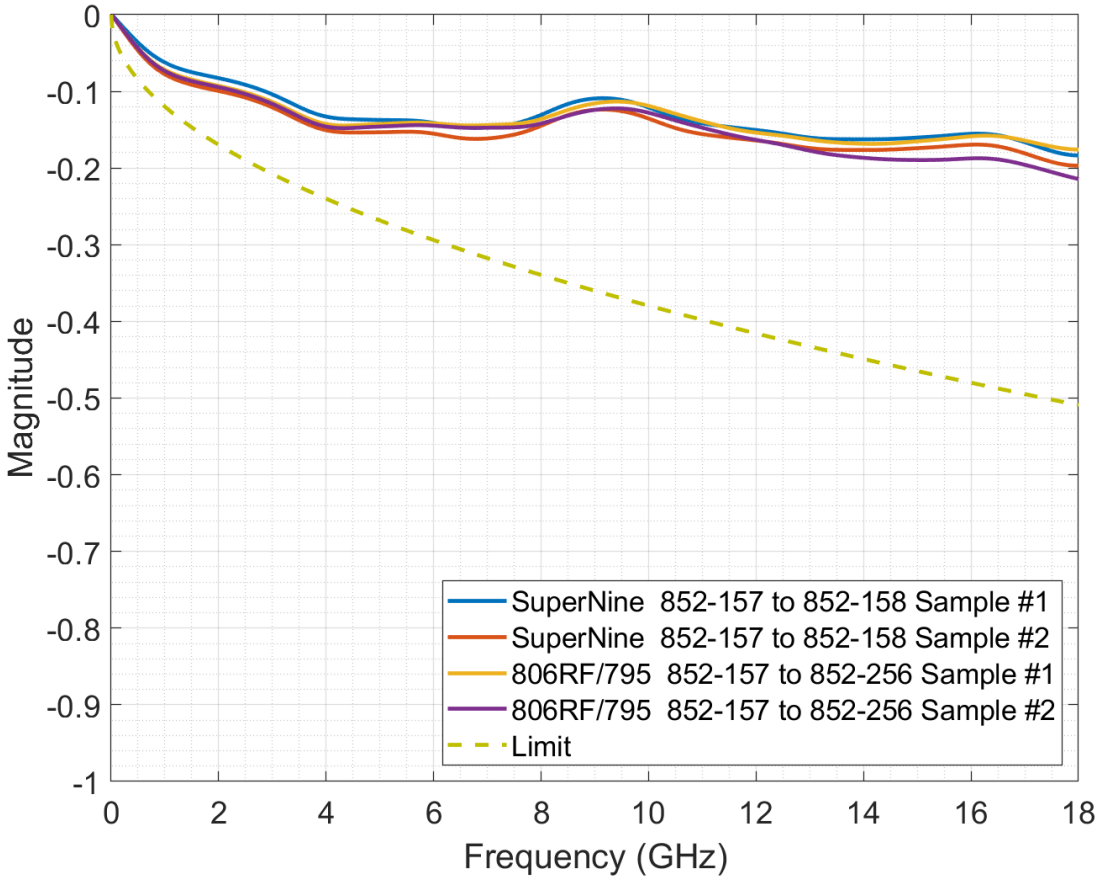

Figure 5. Insertion Loss

3.1.2. VSWR

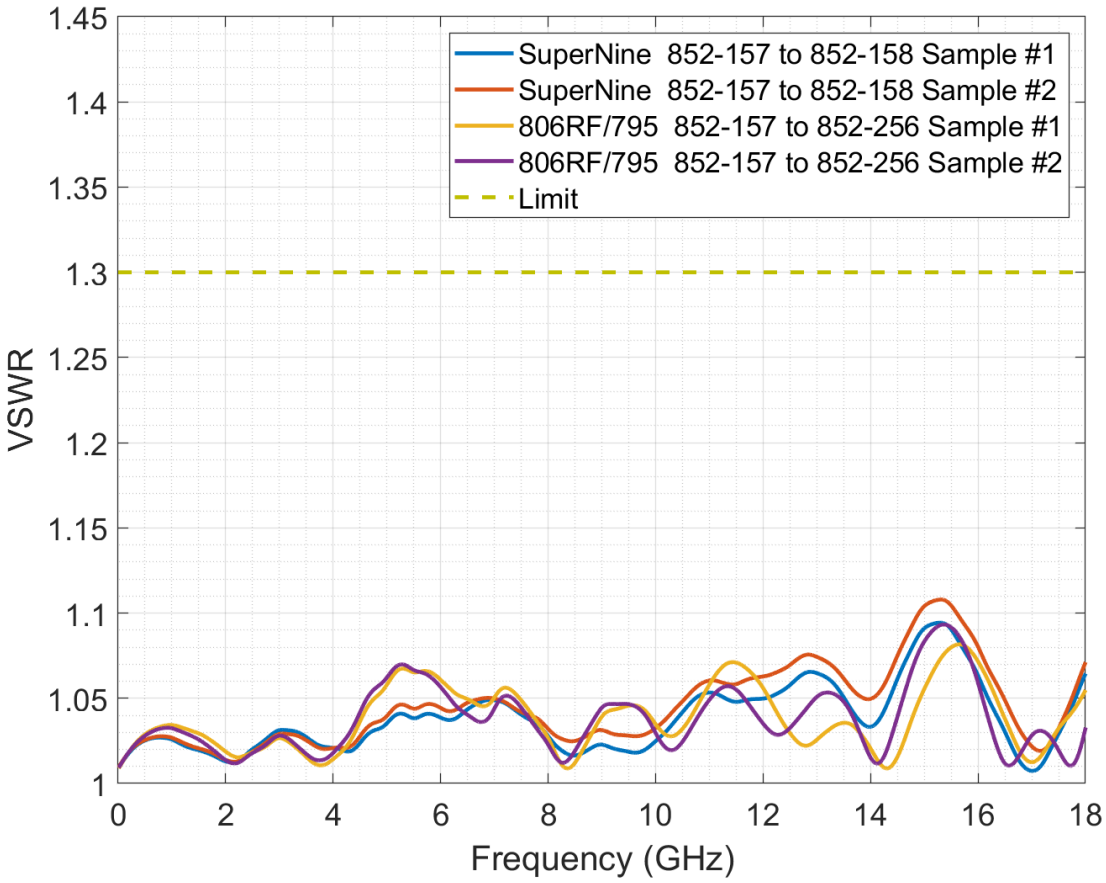

Figure 6. VSWR