



Harwin Test Report Summary

HT00801

Mechanical Forces & Contact Resistance of
M80-055 Power Crimp Socket
(used in M80-715/6/8/9 connectors)

Datamate

Test Report for Datamate (M80 Series) M80-055 Crimp Socket

1. Introduction.

1.1. Description and Purpose.

The Harwin Datamate (M80 Series) connector is manufactured to the requirements of BS9525-F0033. The following tests were carried out on the M80-055 Power Crimp contact, used in the M80-71X series 3-row connectors, to confirm the Mechanical insertion and withdrawal forces, and the Contact Resistance.

1.2. Conclusion.

The following test data has been taken from Harwin test report T36/04. The results show that the M80-055 Power Crimp contact meets all of the specifications. For all the tests, the contact performed well within the requirements, demonstrating stability and reliability.

2. Test Method, Requirements and Results.

2.1. List of Test Samples.

- a) M80-0550005 – Female Power Crimp contact
- b) Ø1mm Steel test pin and Ø1mm Gold test pin

2.2. Specification Parameters.

Contact Resistance (initial) = 10 mΩ maximum

Clip Retention in body = Minimum retention force may be 18N from a sample of 10 sockets, providing the average of the samples is 27N.

Insertion Force with Ø1mm test pin (initial) = 1.5N minimum, 9N maximum

Withdrawal force with Ø1mm test pin (initial) = 1N minimum, 3N maximum

2.3. Test Method and Results.

The following tests were carried out on 50 samples, in accordance with standard test methods used on other Datamate tests.

	Insertion Force	Withdrawal Force	Contact Resistance
Minimum	1.79N	1.09N	1.8mΩ
Maximum	3.26N	1.83N	4.2mΩ
Average	2.58N	1.34N	3.2mΩ