



# LanTEK III | FiberTEK III

Certifier for Copper and Fibre Cabling

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Certifier for Copper and Fibre Cabling

The LanTEK III is an easy to use cable certifier that meets existing TIA and ISO/IEC performance requirements for testing up to Cat 7A/1000MHZ. FiberTEK III adapters are used with LanTEK III for fast and simple certification of high bandwidth single-mode and multimode fibre optic cabling including support for encircled flux testing.



### Test data when you want it, where you want it

Using the free IDEAL AnyWARE app, field technicians can share test data with colleagues or customers without leaving the jobsite, resulting in greater collaboration, more on-time job completions and reduced costs.

### New troubleshooting features that save time and money

Should a cable prove to be faulty, troubleshooting is easy with the introduction of Time Domain Return Loss (TDRL) and Time Domain Near End Cross Talk (TDNEXT) measurements.

To pinpoint fibre cabling faults every FiberTEK III adapter includes a built-in visible light source to help you visually pinpoint faults and locate fibre ports.

These additional features help locate hidden connections, splices and cable faults and can save many hours previously spent troubleshooting problems on the job.

### New permanent link (PL) adapter saves money

New PL adapters reduce down time and lower maintenance costs with field replaceable RJ45 contacts that eliminate the need to replace the complete adapters. New PL adapters feature centred connectors to ensure compatibility with all brands of Cat6A/Class EA cabling solutions. The PL adapters use high performance, ultra-flexible cable that allows them to be used in confined spaces without damaging the PL adapter or the outlet being tested.

### Modular solution to reduce capital costs

For many cable installers there is pressure to reduce capital equipment costs. The LanTEK III and FiberTEK III uniquely offer a pick and mix solution of components, therefore you only pay for what you need. This includes a wide range of test modules, accessories and Careplans to satisfy your specific requirements.



### Permanent Link Testing Modules

To test and certify UTP/STP cabling from the patch panel to the work area outlet. The RJ45 contacts on the tip of the Permanent Link Modules are field replaceable to reduce the cost of ownership.



### Channel Testing Modules

Select from a wide range of Channel testing modules for various applications including: RJ45, GG45, TERA and EC7.



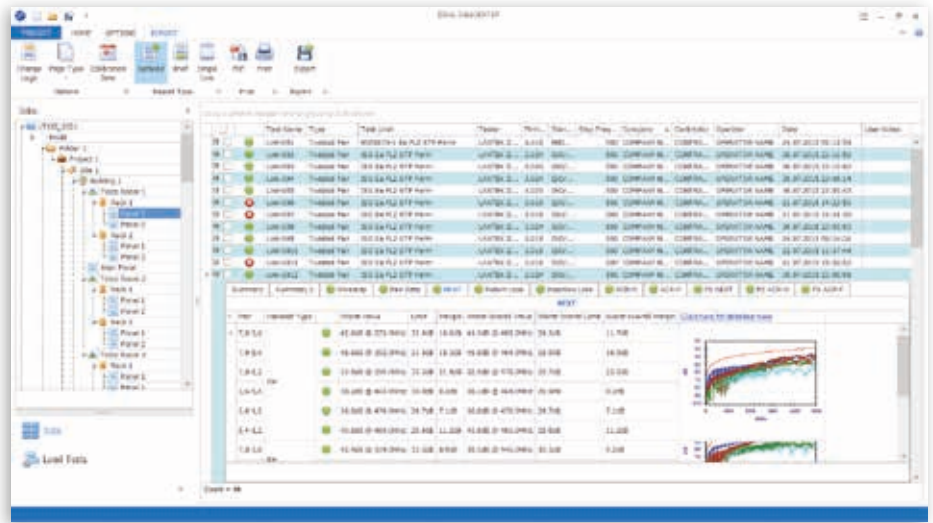
### Fibre Optic Testing Modules

FiberTEK III modules offer fast and simple Tier 1 certification of high bandwidth single-mode and multimode fibre optic cabling including support for encircled flux testing.

# Efficient Data Management Software

IDEAL Data CENTER (IDC) is the free test result management software for the LanTEK III and FiberTEK III series of cable certifiers. IDC allows data cable installation professionals to easily download, manage, edit and print PDF reports. IDC offers a simple user interface with time saving features including:

- Microsoft ribbon toolbars for ease of use
- Only 4 button clicks to import data from the tester
- >10,000 results managed in a single job
- Professional reporting for your clients
- Ability to group and filter test results into categories including:
  - Test limits
  - Devices
  - Or any other data within the database



## Professional Reporting

Automatically generate test reports in PDF or CSV format. The summary page of each report can be customised to include logo, company and operator details.

Choose between 3 different reports that can show either passed, failed or all test results in each report:

- Summary
- Brief
- Full

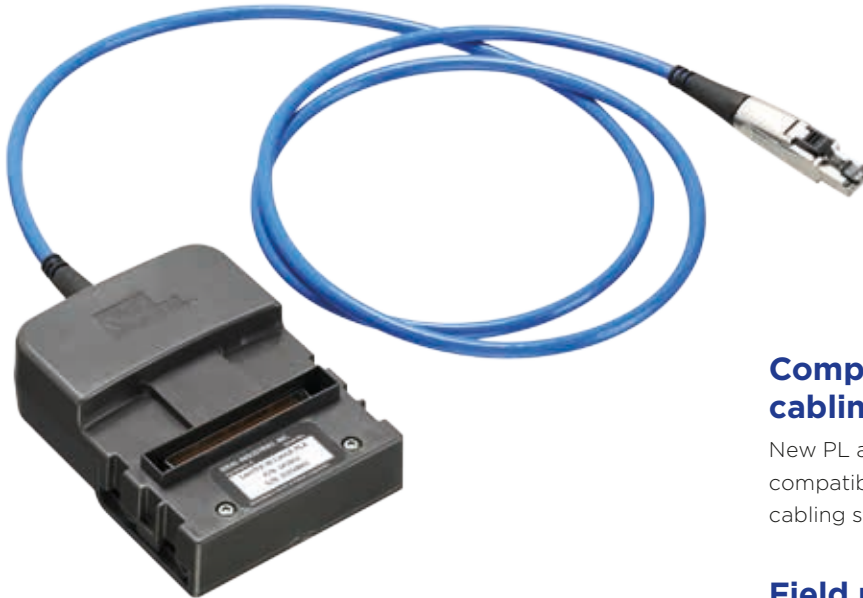
The collage displays three sample test reports generated by IDEAL NETWORKS. Each report is titled "IDEAL INDUSTRIES, INC. CERTIFIED - TEST REPORT" and includes the following elements:

- Job Information:** Job Name, Test Date, Test Time, Test Name, Operator, and Contractor Name.
- Test Results Table:** A table with columns for Test Name, Length (meters), Date (MM/DD/YYYY), Cable Type, Company Name, and Test Standard. It lists numerous individual test results.
- Summary Tables:** Tables for "Progression Data", "Test Results (Pass/Fail)", and "Test Results (All)", providing statistical overviews of the test outcomes.
- Graphs:** Visual representations of test data, showing signal levels over distance for various parameters.
- Pass/Fail Indicators:** Visual cues (like colored bars or text) indicating the status of each test result.
- Page Information:** Includes the IDEAL NETWORKS logo and page number.

# New Permanent Link (PL) adapter

## Operates in the smallest enclosures

The PL adapters use high performance, ultra-flexible cable that allows them to be used in confined spaces without damaging the PL adapter or the outlet being tested.



## Compatible with all RJ45 cabling systems

New PL adapters feature centred connectors to ensure compatibility with all brands of Cat6A/ISO Class E<sub>A</sub> cabling solutions.

## Field replaceable tips that reduce downtime and maintenance costs

New PL adapters reduce down time and lower maintenance costs with field replaceable RJ45 tips that eliminate the need to replace the complete adapters.

To reduce costs the PL adapter tips provide almost three times as many insertions than a regular patch cord before tip replacement is required.

Through innovative design, the entire worn plug assembly is replaced with a completely new plug, contact and locking mechanism.

	IDEAL Networks' PL adapter tip (independently verified)	Regular RJ45 patch cord plug rated by ISO/TIA standards
Number of insertions before contacts are worn and replacement is required	2,000	750

The PL adapter tips can be changed in minutes with 3 simple steps shown below.



### Step 1

Remove screw

### Step 2

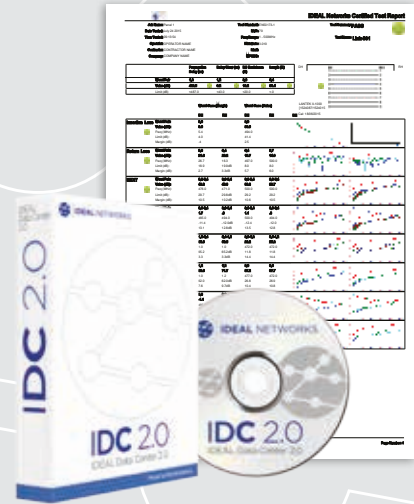
Slide off the old tip and replace with a new one

### Step 3

Replace screw



Send test data from anywhere using the free app



### Step 1

#### Test

- Set up project
- Perform autotest on copper/fibre cabling

### Step 2

#### Connect & Send

- Activate the LanTEK III wireless hotspot
- Connect your mobile device with the IDEAL AnyWARE app.
- Transfer test data to your mobile device
- Send data using email or your preferred file sharing app.

### Step 3

#### Create PDF reports with IDC

- Receive test data on your PC via email or file sharing method.
- Analyse and process data
- Create PDF reports

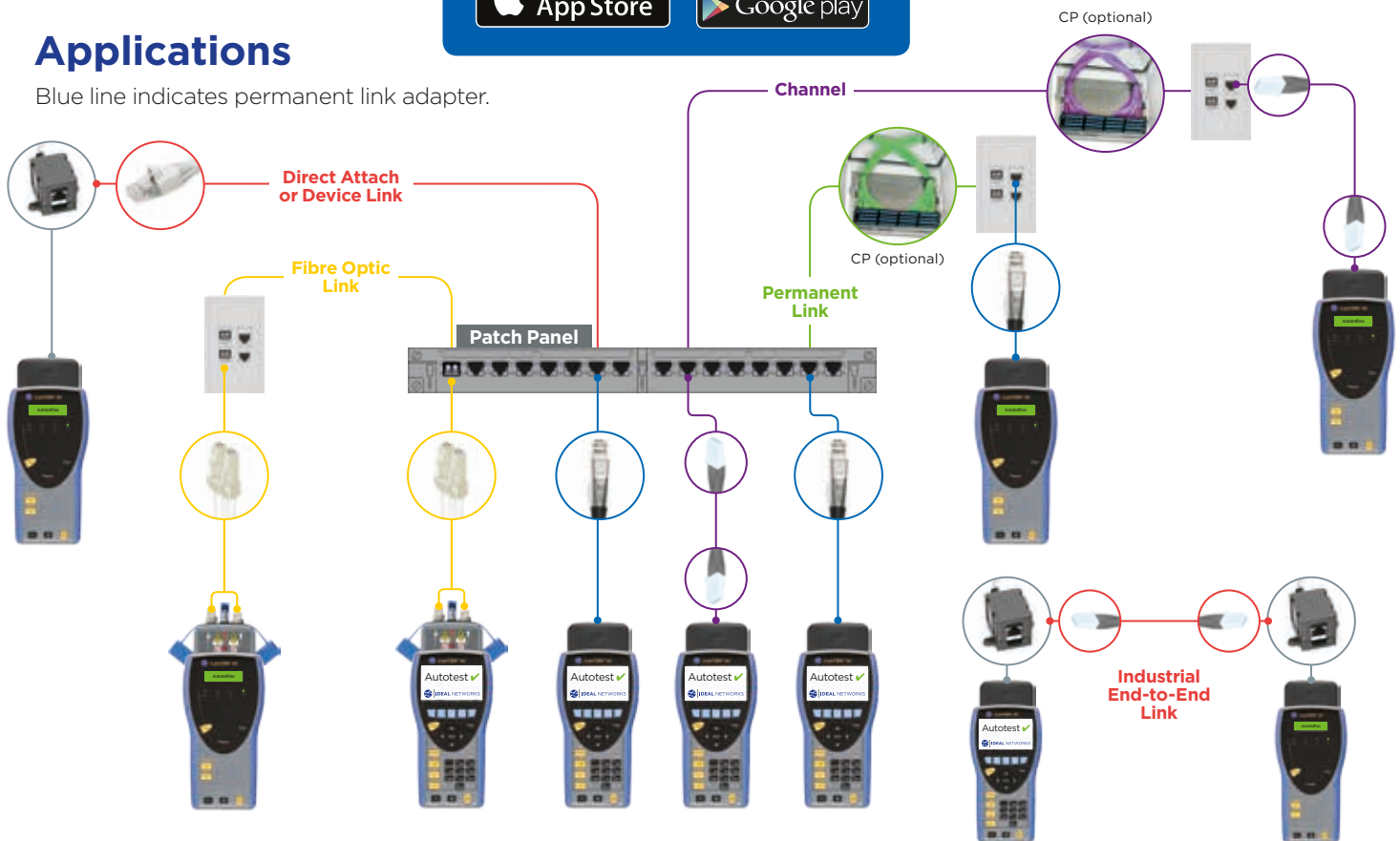
**Download the FREE app today**

Download on the  
**App Store**

GET IT ON  
**Google play**

## Applications

Blue line indicates permanent link adapter.



# LanTEK III

**Independently verified**

Accuracy verified by Intertek



**Rugged design**

Rubberised housing, protected screen and protected measurement port

**Share test data**

Provides mobile device connectivity using the USB Wi-Fi adapter and free IDEAL AnyWARE app



**Long life battery**

18 hours continuous use in the field

**Replaceable Cat. 6A permanent link adapter tips**

Reduces cost of ownership. Centred connectors provide minimal tolerance and are compatible with all RJ45 twisted pair cabling connectors (optional)



**Troubleshooting**

Time Domain Return Loss (TDRL) and NEXT (TDX) to locate hidden connections, splices and cable faults

**Tone generator on both test units**

Ability to identify and trace cables with a compatible amplifier probe (62-164)

**Autotest on both test units**

Comprehensive test results within seconds. Allows one person testing

**Wiremap test button**

Shortcut to quickly access wiremap results

**Talk Set**

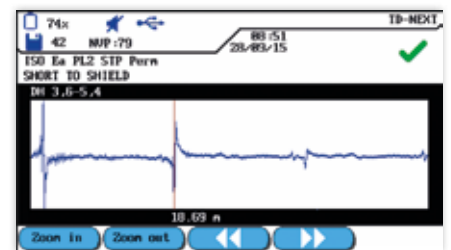
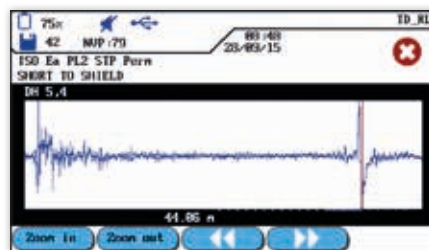
Talk to a colleague over copper or fibre links



## New troubleshooting features that save time and money

Should a cable prove to be faulty, troubleshooting is easy with the introduction of Time Domain Return Loss (TDRL) and Time Domain Near End Cross Talk (TDNEXT) measurements. These additional features help locate hidden connections, splices and cable faults and can save many hours previously spent troubleshooting problems on the job.

### TDX - Example: Consolidation Point



# FiberTEK III

## Troubleshooting

Red laser light source to visually pinpoint faults and locate fibre ports

## Protected test ports

Attached covers protect ports, minimise contamination and will not be misplaced

## Supports all common connector types

SC, FC, ST adapters included. LC adapters optional

## Certification

Tier 1 certification of single-mode and multimode fibre optic cabling

## Encircled Flux compliance

Enables compliance to the new 2016 fibre standards IEC 14763-3 and ANSI/TIA- 526-14-C (optional accessory – see back page for details)

## Field calibration

Allows 1 and 3 jumper field calibration methods to ensure accuracy and compliance to IEC and ANSI/TIA standards

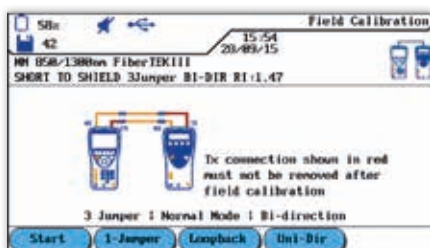
## Simplified bi-directional measurements

Eliminates process of manually merging directional tests into one record

## Complies with all international standards including TIA, ISO/IEC

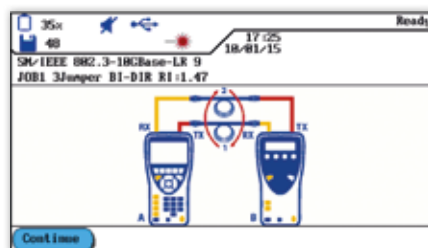
See website for full details

## Fibre certification wizard to simplify setup and testing



### Setup Wizard

Select field calibration (1-Jumper|3-Jumper) and measurement modes (Loopback|Normal), (Uni-Directional|Bi-Directional).



### Auto-test

Perform auto-tests using the intuitive graphical interface to reduce mistakes and ensure accurate certification results.

Cable ID: TEST0000		Fiber Core: 9um		Length: 3195.5ft	
Fiber 1		Fiber 2			
	Wavelength	Margin	Wavelength	Margin	Budget
1310nm	00.2db	04.8db	00.9db	04.1db	05.8db
1550nm	00.0db	-0.8db	01.0db	-1.0db	00.8db
1310nm	00.2db	04.8db	00.8db	04.2db	05.8db
1550nm	00.0db	-0.8db	01.0db	-1.0db	00.8db

### Review Results

Tier 1 certification results display:

- ISO/TIA/IEEE test standard
- Pass/Fail result
- dB loss of each fibre at each wavelength
- dB loss in each direction (when testing bi-directionally)
- Fibre link length
- dB margin / headroom

# LanTEK III

Certifier for  
Copper Cabling



## Ordering information

Part No.	Kit Contents
R161001	<b>LanTEK III-500MHz - (test adapters to be ordered separately)</b> Includes 500 MHz cable certifier, TIA/EIA category 6A/ ISO Class E <sub>A</sub> , LanTEK III display/remote handsets, Li-ion battery (2), universal power adapter (2), USB cable, headset (2), hanging strap (2), quick reference guide, carry case, USB Wi-Fi adapter (1)
R161002	<b>LanTEK III-1000MHz - (test adapters to be ordered separately)</b> Includes 1000 MHz cable certifier, TIA/EIA category 7A/ ISO Class F <sub>A</sub> , LanTEK III display/remote handsets, Li-ion battery (2), universal power adapter (2), USB cable, headset (2), hanging strap (2), quick reference guide, carry case, USB Wi-Fi adapter (1)
R161003	<b>LanTEK III-500MHz - (including PL adapters)</b> Includes 500 MHz Cable Certifier, TIA/EIA Category 6A/ ISO Class E <sub>A</sub> , LanTEK III display/remote handsets, Li-ion battery (2), universal power adapter (2), USB cable, headset (2), hanging strap (2), quick reference guide, carry case, USB Wi-Fi adapter (1), permanent link adapter - R161051 (2)
R161004	<b>LanTEK III-1000MHz - (including PL adapters)</b> Includes 1000 MHz Cable Certifier, TIA/EIA Category 7A/ ISO Class F <sub>A</sub> , LanTEK III display/remote handsets, Li-ion battery (2), universal power adapter (2), USB cable, headset (2), hanging strap (2), quick reference guide, carry case, USB Wi-Fi adapter (1), permanent link adapter - R161051 (2)
TRADE161003	Trade-In of any CAT5 (and higher) cable tester to a LanTEK III-500MHz
TRADE161004	Trade-In of any CAT5 (and higher) cable tester to a LanTEK III-1000MHz

## Optional adapters and accessories for LanTEK III

Part No.	Description
R161051	LT III-CAT6A RJ45 permanent link adapter (single)
R161052	LT III-CAT5e/6 RJ45 channel adapter (single)
R161053	LT III-CAT6A RJ45 channel adapter (single)
R161054	LT III-CAT7A TERA universal link adapter (single)
R161055	LT III-CAT7A EC7 universal link adapter (single)
R161056	LT III-CAT7A GG45 universal link adapter (single)
R161057	LT III-Coax adapter (single)
R161063	LT III-Coax calibration cable (single)
R161050	LT III-CAT6A PLA replacement tips (pair)
R160050	LT III-Industrial Ethernet kit

## LanTEK III Careplans

Part No.	Description
LANTEK-1Y	Careplan - 1 year
LANTEK-2Y	Careplan - 2 years
LANTEK-3Y	Careplan - 3 years

**Included:** Standard repairs, one free calibration per year, loan tester in the unlikely event of instrument failure, on-site collection and delivery, firmware and hardware updates free of charge within the original specifications of the instrument, free technical support and LAN Careplan certificate.

For Careplan details, please visit: [www.idealnetworks.net](http://www.idealnetworks.net)

# FiberTEK III

Certifier for  
Fibre Cabling



## Ordering information

Part No.	Kit Contents
R164005	<b>FiberTEK III-MM LED Kit</b> - Includes two multimode FiberTEK III modules, lockable semi-rigid carrying case, SC, FC, ST adapters for modules (2 ea.), SC-SC patch cords 6x 50µm MMF compliant to ISO/IEC 14763-3 standard, quick reference guide.
R164006	<b>FiberTEK III-SM Laser Kit</b> - Includes two single-mode FiberTEK III modules, lockable semi-rigid carrying case, SC, FC, ST adapters for modules (2 ea.), SC-SC patch cords 6x 9µm SMF compliant to ISO/IEC 14763-3 standard, quick reference guide.
R164007	<b>FiberTEK III-MM LED &amp; SM Laser Kit</b> - Includes two multimode FiberTEK III modules, two single-mode FiberTEK III modules, lockable semi-rigid carrying case, SC, FC, ST adapters for modules (2 ea.), SC-SC patch cords 6 x 9µm SMF and 6 x 50µm MMF compliant to ISO/IEC 14763-3 standard, quick reference guide.

FiberTEK III modules are compatible with LanTEK II.

## Optional accessories for FiberTEK III

Part No.	Description
R164060	FT III-Set of SC, FC and ST screw-on adapters
R164050	FT III-Encircled Flux 50/125um cable SC - SC
R164051	FT III-Encircled Flux 50/125um cable SC - LC
R164063	FT III-Carrying Case (Single)



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Job Name: Quality.job

Test Standard: TIA 568-C.2

Test Summary: PASS



Date Tested: July 08 2016

NVP: 72 %

Time Tested: 12:45:11

Freq Range: 1 - 250MHz

Test Name: QualityTest

Operator: OPERATOR NAME

Firmware: 3.086

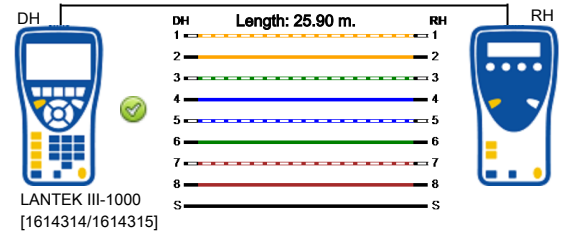
Contractor: CONTRACTOR NAME

Limit: Cat 6-250 STP Chan

Company: COMPANY NAME

MFGBD:

Headroom	Propagation Delay (ns)	Delay Skew (ns)	DC Resistance (Ω)	Length (m.)
<b>68.5 dB</b>				
Worst Pair	7,8	7,8	7,8	5,4
Value	121.2	1.1	5.4	25.9
Limit	<555.0	<50.0	<20.0	<100.0



Worst Case (Margin)      Worst Case (Value)

		DH	RH	DH	RH	DH	RH
<b>Insertion Loss</b>	Worst Pair:	3,6	3,6	3,6	3,6		
	Value (dB):	1.1	8.8				
	Freq (MHz):	2.5	249.0				
	Limit (dB):	3.2	35.9				
	Margin (dB):	2.1	27.1				
<b>Return Loss</b>	Worst Pair:	3,6	3,6	3,6	3,6		
	Value (dB):	20.6	15.2	16.0	15.2		
	Freq (MHz):	82.8	249.0	249.0	249.0		
	Limit (dB):	12.8	8.0dB	8.0	8.0		
	Margin (dB):	7.8	7.2dB	8.0	7.2		
<b>NEXT</b>	Worst Pair:	3,6-1,2	3,6-5,4	3,6-5,4	3,6-5,4		
	Value (dB):	71.5	45.8	46.4	45.5		
	Freq (MHz):	1.9	220.0	248.0	234.0		
	Limit (dB):	65.0	34.1dB	33.2	33.6		
	Margin (dB):	6.5	11.7dB	13.2	11.9		
<b>ACR-N</b>	Worst Pair:	3,6-1,2	3,6-1,2	3,6-5,4	3,6-5,4		
	Value (dB):	70.8	77.0	37.7	37.2		
	Freq (MHz):	1.9	1.9	248.0	234.0		
	Limit (dB):	62.0	62.0dB	-2.6	-1.0		
	Margin (dB):	8.8	15.0dB	40.3	38.2		
<b>ACR-F</b>	Worst Pair:	5,4-3,6	3,6-5,4	7,8-5,4	5,4-7,8		
	Value (dB):	71.8	71.8	27.3	27.3		
	Freq (MHz):	1.0	1.0	250.0	250.0		
	Limit (dB):	63.3	63.3dB	15.3	15.3		
	Margin (dB):	8.5	8.5dB	12.0	12.0		
<b>PS NEXT</b>	Worst Pair:	3,6	3,6	5,4	3,6		
	Value (dB):	71.1	43.4	45.3	43.4		
	Freq (MHz):	1.9	220.0	248.0	220.0		
	Limit (dB):	62.0	31.1dB	30.2	31.1		
	Margin (dB):	9.1	12.3dB	15.1	12.3		
<b>PS ACR-N</b>	Worst Pair:	3,6	3,6	5,4	3,6		
	Value (dB):	70.4	76.2	36.8	35.5		
	Freq (MHz):	1.9	1.9	248.0	220.0		
	Limit (dB):	59.0	59.0dB	-5.6	-2.2		
	Margin (dB):	11.4	17.2dB	42.4	37.7		
<b>PS ACR-F</b>	Worst Pair:	5,4	5,4	7,8	5,4		
	Value (dB):	71.0	69.4	26.0	25.0		
	Freq (MHz):	1.0	1.0	250.0	237.5		
	Limit (dB):	60.3	60.3dB	12.3	12.7		
	Margin (dB):	10.7	9.1dB	13.7	12.3		

User Notes: