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Support for Your Product

Agilent no longer sells or supports this product. Our service centers may be able to perform calibration if no repair parts are needed, but no other support from Agilent is available. You will find any other available product information on the Agilent Test & Measurement website, <u>www.tm.agilent.com</u>.

HP References in this Manual

This manual may contain references to HP or Hewlett-Packard. Please note that Hewlett-Packard's former test and measurement, semiconductor products and chemical analysis businesses are now part of Agilent Technologies. We have made no changes to this manual copy. In other documentation, to reduce potential confusion, the only change to product numbers and names has been in the company name prefix: where a product number/name was HP XXXX the current name/number is now Agilent XXXX. For example, model number HP8648A is now model number Agilent 8648A.

HP 37717C Quick Reference Guide

Setting the Interfaces

Setting the Transmit Interfaces

Setting PDH Transmit Interface	Transmit	
Setting PDH Transmit Binary Interface	Transmit	[PDH] BINARY
Setting SDH Transmit Interface	Transmit	[SDH] SDH
Setting Jitter Transmit Interface	Transmit	[SDH] JITTER OR Transmit [PDH] JITTER
Setting Wander Transmit Interface	Transmit	[SDH] JITTER OR Transmit [PDH] JITTER
Selecting the Physical Transmit Interface for ATM Payloads	Transmit	
Setting SDH THRU Mode	Transmit	[SDH] SIGNAL [] [THRU MODE]

Setting the Receive Interfaces

Using Autosetup	Autosetup
Setting PDH Receive Interface	Receive [PDH] MAIN SETTINGS
Setting PDH Receive Binary Interface	
Setting SDH Receive Interface	Receive [SDH] SDH
Setting Jitter Receive Interface	Receive [SDH JITTER] OR Receive [PDH] JITTER
Selecting the Physical Receive Interface for ATM payloads	

Selecting Test Features

Selecting and Using Overhead Features

Using Transmit Overhead Setup	Transmit [SDH] OVERHEAD SETUP
Using Receive Overhead Monitor	
Setting Overhead Trace Messages	Transmit [SDH] OVERHEAD SETUP [TRACE]
Generating Overhead Sequences	Transmit [SDH] TEST FUNCTION [SDH] [SEQUENCES]
Using Receive Overhead Capture	

Selecting and Using Signal Features

Adding Frequency Offset to the SDH Signal	Transmit [SDH] SDH CLOCK [INTERNAL] OFFSET [ON]
Adding Frequency Offset to the PDH Signal	Transmit [PDH] MAIN SETTINGS FREQUENCY OFFSET [<select>]</select>
Setting up Signaling Bits	Transmit [PDH] TEST FUNCTION
Setting Transmit Structured Payload/Test Signal	Transmit [SDH] STRUCT'D OR Transmit [PDH] STRUCT'D SETTINGS
Setting Receive Structured Payload/Test Signal	
Connecting A Telephone Handset	Transmit [SDH] STRUCT'D TEST SIGNAL [64 kb/s] [HANDSET]
	Transmit [PDH] SETTINGS TEST SIGNAL [64 kb/s] [HANDSET]
Setting Transmit N X 64 kb/s Structured Payload/Test Signal	Transmit [SDH] STRUCT'D TEST SIGNAL [Nx64]
	Transmit [PDH] STRUCT'D TEST SIGNAL [Nx64]
Setting Receive N X 64 kb/s Structured Payload/Test Signal	Receive [SDH] STRUCTD TEST SIGNAL [Nx64]
	Receive [PDH] STRUCT'D TEST SIGNAL [Nx64]

Selecting and Using Signal Features (cont'd)

Inserting an External PDH Payload/Test Signal	Transmit [SDH] STRUCT'D 2M PAYLOAD [INSERT 2Mb/s]
	Transmit [PDH] STRUCT'D 2M PAYLOAD [INSERT 2Mb/s]
Dropping an External Payload/Test Signal	Receive [SDH] STRUCTD 2M PAYLOAD [DROP 2Mb/s]
	Receive [PDH] STRUCT'D 2M PAYLOAD [DROP 2Mb/s]
Selecting ATM Cell Stream Payload	Transmit [ATM] ATM CELLSTREAM [CONTENTS]
Selecting ATM Cell Stream Timing Distribution	Transmit [ATM] ATM CELLSTREAM [DISTRIBUTION]
Selecting ATM Cell Stream Headers and Interface	Transmit [ATM] ATM CELLSTREAM [CONTENTS]
Adding Errors & Alarms at the SDH Interface	Transmit [SDH] TEST FUNCTION TEST FUNCTION [SDH] [ERR & ALARM]
Adding Errors & Alarms to the PDH Interface/PDH Payload	Transmit [SDH] TEST TEST FUNCTION [PDH PAYLD] [ERR & ALARM]
Using FEAC Codes in the HP 37717C	
Adding ATM Errors and Alarms	Transmit [ATM] TEST TEST FUNCTION [ATM PAYLD] [ERR & ALARM]
Setting PDH Spare Bits	Transmit [SDH] TEST FUNCTION TEST FUNCTION [PDH PAYLD] [SPARE BITS]

Selecting and Using Signal Features (cont'd)

Adding Pointer Adjustments	Transmit [SDH] TEST FUNCTION TEST FUNCTION [SDH] [ADJUST POINTER]
Using Pointer Graph Test Function	
Stressing Optical Clock Recovery Circuits	Transmit [SDH] TEST FUNCTION [SDH] [STRESS TEST]
Generating Automatic Protection Switch Messages	Transmit [SDH] TEST FUNCTION TEST FUNCTION [SDH] [APS MESSAGES]
Inserting & Dropping Data Communications Channel	Transmit [SDH] TEST FUNCTION [SDH] [DCC INSERT/ DROP]

Making Measurements

Using Overhead BER Test Function	Receive [SDH] TEST TEST FUNCTION [OVERHEAD BER]
Test Timing	Results TIMING CONTROL
Making SDH Analysis Measurements	Results [SDH] ANALYSIS
Making PDH Analysis Measurements	Results [PDH] ERROR ANALYSIS
Measuring Jitter	Results JITTER
Measuring Wander	Results WANDER
Measuring Frequency	Results [SDH] FREQUENCY OR Results [PDH] FREQUENCY
Measuring Optical Power	Results [SDH] OPTICAL POWER
Measuring Round Trip Delay	Results [PDH PAYLD] [TRIP DELAY]
Monitoring Signaling Bits	Results [PDH PAYLD] [SIG/BIT MONITOR]
Measuring Service Disruption Time	Results SRVC DISRUPT

Making Measurements (cont'd)

Performing an SDH Tributary Scan	Transmit [SDH] TEST [TRIB SCAN]
	Results [SDH] [TRIB SCAN]
Performing an SDH Alarm Scan	Transmit [SDH] TEST [ALM SCAN]
	Results [SDH] [ALM SCAN]
Performing a PDH Alarm Scan	Results [PDH] [ALM SCAN]
Measuring Jitter Tolerance	Transmit [PDH] JITTER [TOLERANCE]
Measuring Jitter Transfer	Transmit [PDH] JITTER [TRANSFER FN]
Selecting the ATM Measurement Parameters	
Making ATM Measurements	Results [ATM]
Measuring Cell Transfer Delay and Cell Delay Variation	Results [ATM] [CELL DELAY]
Measuring ATM Non-Conforming cells and one-point Cell Delay Variation	
Monitoring ATM Alarms	Results [ATM] [ALARM SECONDS]

Storing, Logging and Printing

Saving Graphics Results to Instrument Store	Results	[TIMING CONTROL] GRAPH STORAGE [1 MIN RESOLN]
Recalling Stored Graph Results	Graph	TEXT RESULTS STORE STATUS
Viewing the Bar Graph Display	Graph	GRAPH RESULTS
Viewing the Graphics Error and Alarm Summaries	Graph	TEXT RESULTS
Logging Graph Displays	Other	[LOGGING] LOGGING SETUP [DEVICE]
Logging Results	Other	[LOGGING] LOGGING SETUP [CONTROL]
Logging Results to Centronics Printer	Other	[LOGGING] LOGGING SETUP [DEVICE]
Logging Results to HP-IB Printer	Other	[LOGGING] LOGGING SETUP [DEVICE]
Logging Results to Internal Printer	Other	[LOGGING] LOGGING SETUP [DEVICE]
Logging Results to RS-232-C Printer	Other	[LOGGING] LOGGING SETUP [DEVICE]
Logging Jitter Tolerance Results	Other	[LOGGING] LOGGING SETUP [DEVICE]
Logging Jitter Transfer Results	Other	[LOGGING] LOGGING SETUP [DEVICE]

Using Instrument and Disk Storage

Storing Configurations in Instrument Store	Other [STORED SETTINGS]
Storing Current Configurations on Disk	Other [FLOPPY DISK]
Setting up a Title for Configurations in Instrument Store	Other [STORED SETTINGS]
Recalling Configurations from Instrument Store	Other [STORED SETTINGS]
Formatting a Disk	Other [FLOPPY DISK]
Labeling a Disk	Other [FLOPPY DISK]
Managing Files and Directories on Disk	Other [FLOPPY DISK]
Adding Descriptors to Disk Files	Other [FLOPPY DISK]
Saving Graphics Results to Disk	Results [TIMING CONTROL] GRAPHIC STORAGE [DISK]
Saving Data Logging to Disk	Other [FLOPPY DISK] DISK OPERATION [SAVE]

Using Instrument and Disk Storage (cont'd)

Recalling Configuration from Disk	Other [FLOPPY DISK] DISK OPERATION [RECALL]
Recalling Graphics Results from Disk	Other [FLOPPY DISK] DISK OPERATION [RECALL]
Copying Configuration from Instrument Store to Disk	Other [FLOPPY DISK] DISK OPERATION [FILE]
Copying Configuration from Disk to Instrument Store	Other [FLOPPY DISK] DISK OPERATION [FILE]
Copying Graphics Results from Instrument Store to Disk	Other [FLOPPY DISK] DISK OPERATION [FILE]
Deleting a File on Disk	Other [FLOPPY DISK] DISK OPERATION [FILE]
Deleting a Directory on Disk	Other [FLOPPY DISK] DISK OPERATION [FILE]
Renaming a File on Disk	Other [FLOPPY DISK] DISK OPERATION [FILE]
Creating a Directory on Disk	Other [FLOPPY DISK] DISK OPERATION [FILE]

Selecting and Using "Other" Features

Coupling Transmit & Receive Settings	Other [SETTINGS CONTROL]
Suspending Test on Signal Loss	Other [MISCELLANEOUS]
Setting Time & Date	Other [TIME AND DATE]
Enabling Keyboard Lock	Other [MISCELLANEOUS]
Enabling Beep on Received Error	Other [MISCELLANEOUS]
Enabling Analysis Control	Other [MISCELLANEOUS]
Setting Error Threshold Indication	Other [COLOR CONTROL]
Dumping Display to Disk	Other [LOGGING] LOGGING SETUP [CONTROL] LOG ON DEMAND [SCREEN DUMP]
Setting Screen Brightness and Color	Other [COLOR CONTROL]
Running Self Test	Other [SELF TEST]

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