E6474A Drive Test
Analysis Solution

Key Benefits

- Eliminates interrupted tests waiting for post-processing tools catch up
- Resolve problems faster with pre-defined Area, Event, and Report tools
- Unique, customized reports reduce time spent processing and analyzing data, including KPIs, to quickly diagnose root causes for network issues
- Standardize and automate engineering practices for optimal performance across your entire engineering organization
- Reduce costs by standardizing on one tool that gives a complete picture from combined data sources such as OSS, network elements, other Drive Test solutions, and more

Key Features

- Simultaneous support for all new E6474A versions on release
- Powerful analysis toolboxes for all major wireless technologies
- Flexible custom report generator
- Automate work processes
- Compatible with other data sources

Applications

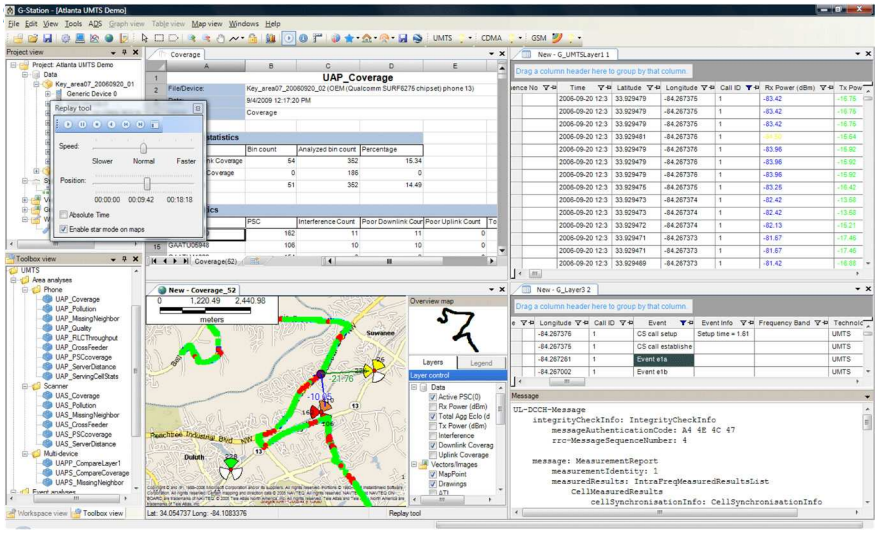
- Detailed network troubleshooting
- Network coverage analysis
- Network performance analysis
- Custom report generation

Software Overview

The Analysis Solution is a post-processing optimization platform that analyzes cellular interface data that was collected using the E6474A Drive-Test Wireless Network Optimization Software. The analyzed data streams are combined in the collection system and come from two sources:

- Air Interface – data fields that relate to the user's specific radio technology
- Navigation – a position (or geodetic reference) and time stamp for each data reading

This combined data lets you evaluate the characteristics of the cellular system to determine problem areas and plan improvements based on time of day and the physical location of the data readings.



Software

The Analysis Solution (also known as G-Station or Gladiator) visually represents collected drive-test data through a variety of tools including tables, maps, graphs, and statistical windows so you can:

- examine the characteristics of the radio environment based on the data collected for your network.
- identify the problems in your current cellular network.
- use current system analysis optimize network configurations to meet future demands.
- create presentations and reports within the software or export analyses in formats supported by most common office applications.

The wireless information available for analysis depends on the technology and the data collection system used. Data may include:

- Signal strength information to help evaluate network coverage
- Call processing information to help evaluate network call handling
- Quality information to determine the network's state from the scribers' viewpoint

The Analysis Solution processes and analyzes complex attributes of the air interface, such as signaling primitives, RF field strength, bit error rate, and audio quality as measured from RF communication networks. The solution can process numerous measurements to create dynamic map overlays, performance charts, and statistical graphs and tables to support confident decision-making.

The Analysis Solution software supports all major technologies with appropriate analysis tools for 2G/2.5G (GSM/GPRS/EDGE), 3G (cdma2000/EV-DO/UMTS/HSPA) and 4G (WiMAX and LTE) technologies.

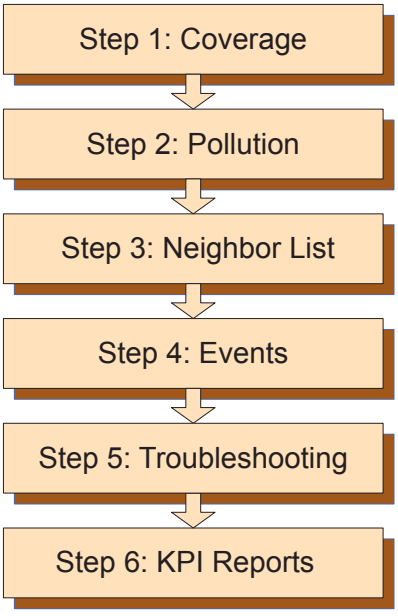


Figure 1. The six-step engineering process

Platform Features

Visual capabilities

- Table view – presents data in tabular format
- Graph view – charts the measured data
- Map view – geographically displays the data
- Decoder window – displays the decoded protocol messages
- Replay view – replays the measured data
- Worksheet – displays data in spreadsheet format

Analysis capabilities

The Analysis Solution provides an extensive set of analysis tools for each of the supported technologies. The analyses are streamlined through a six-step optimization process, shown in Figure 1, to help you complete the most common engineering post-processing tasks.

Development capabilities

The Analysis Solution offers a set of tools in the Custom Report Generator (CRG) for application development that lets you extend the platform's capabilities. The CRG reporting engine lets you create custom reports through an easy-to-use GUI for output in Excel format.

Analysis Solution Views

The Analysis Solution presents measured data in table, graph, or map views.

Table View

Figure 2 shows an example of the table view which presents measured data stored in the Analysis Solution database. In addition to visualizing data, table view lets users mine for detailed data and then export it in several data formats. Table view is the principle way output from the Analysis Solution message decoders and the call flow state machine are presented.

Features include:

- Data filtering – build complex boolean filters to display the data you want
- Color-coding results – highlight data points
- Data pivoting – change data layout to explore information relationships
- Exporting – export tables or sections from tables in various formats

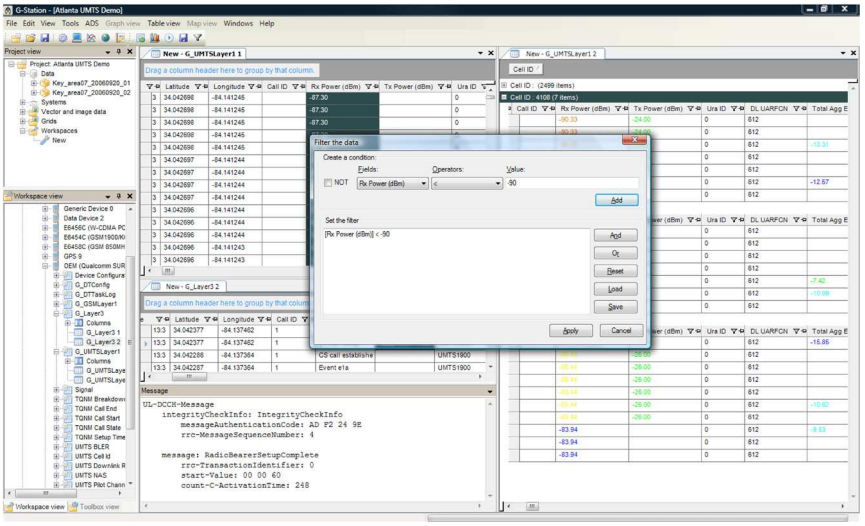


Figure 2. Examples of Analysis Solution table view

Graph View

Figure 3 shows the data in graph view where it is displayed in various charts that you can customize and easily incorporate into high-quality presentations and reports.

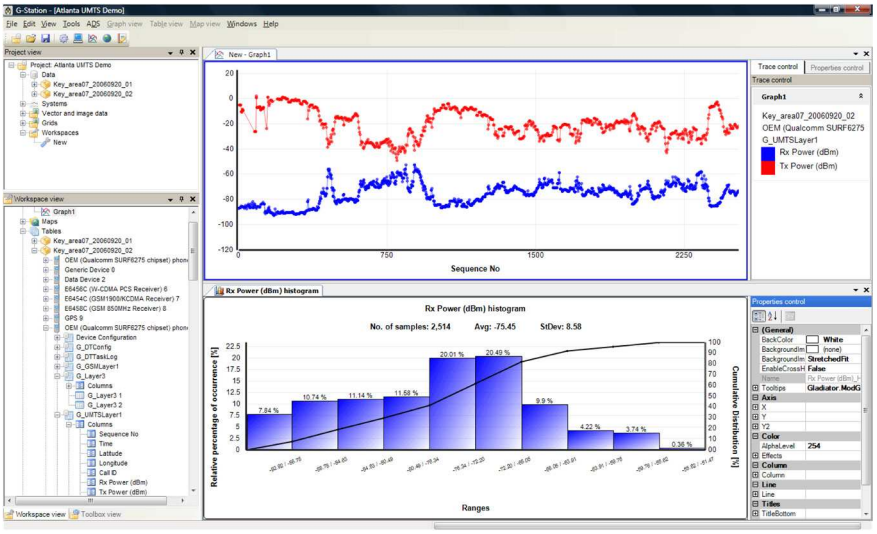


Figure 3. Examples of Analysis Solution graph view

Features include:

- Stacking or overlaying charts
- Zooming in and out to see important data change points
- Synchronizing between map and table data
- Saving graphs – save important graphs for later recall and analysis
- Selecting data – select and analyze portions of graphs

Map View

Figure 4 shows the map view used to present geographically referenced data. The Analysis Solution map view is based on Pitney Bowe's MapXtreme® engine and supports all Mapinfo data types, such as MIF, TAB, and GRD. Map view provides these comprehensive features:

- Replays data
- Supports Google Earth® and Terra Server®
- Various data display capabilities:
  - Neighbor analysis
  - Spider (star mode)
  - Spatial filtering
  - Polygon-based filtering, and many others

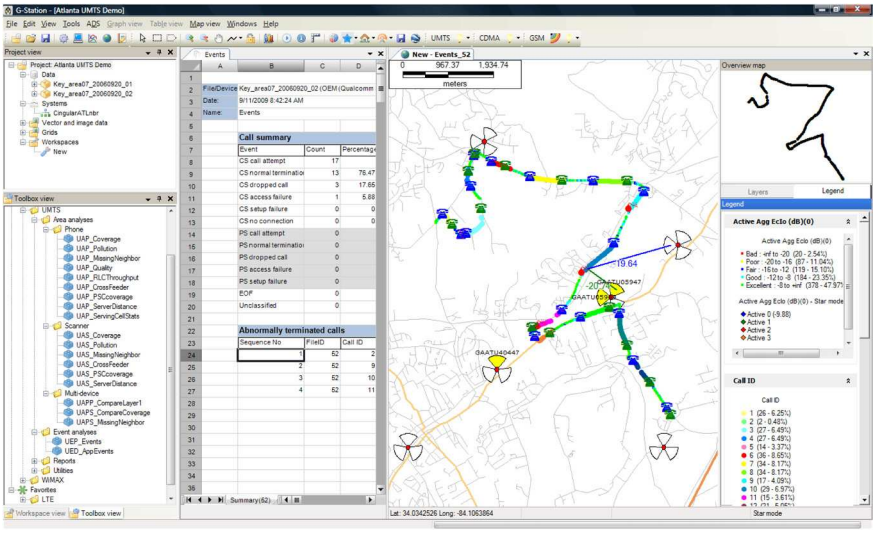


Figure 4. Analysis Solution worksheet and map views

Analysis Solution Toolboxes

The Analysis Solution toolboxes provide "single-click" utilities for troubleshooting cellular network operation problems. A toolbox is available for each supported cellular technology and its content is divided into these sections:

- Area Analyses is used to troubleshoot network problems, such as coverage issues (uplink and downlink), interference or pollution problems, or missing neighbors, occurring over large geographical areas. Users can perform area analyses using measured data from a phone, data card, or digital RF receivers. Each analysis is thoroughly documented and may be used in either an interactive mode or in a batch automated mode.
- Event Analyses is used to troubleshoot call events. Event analyses automatically detects abnormally terminated events like dropped or blocked calls and automatically performs analysis to diagnose problem. As part of the events analyses, the Analysis Solution incorporates a sophisticated set of decoders which support protocol analysis for each placed call as well as accurate call classification algorithms. In many cases, it will recommend ways to solve the problem.
- Reports is used to automatically report network performance indicators. The reports support statistical evaluation of any measured parameter and polygon filtering.
- KPI Module is used for compliance testing and comes with a large predefined set of commonly used KPIs. Also, new KPIs can be easily added.
- Utilities is a set of features used to adjust KPI default settings and to evaluate the network's primary reuse plan or to plan the neighbor list.

Figure 5 shows example Analysis Solution analysis outputs. Mapping features like site data, star mode, and neighbor data help to identify problems more accurately. Analysis output can guide engineers toward appropriate courses of action. Toolbox analyses are streamlined through the six-step optimization process to facilitate workflow. An appropriate set of analyses for each step can be executed with a single click.

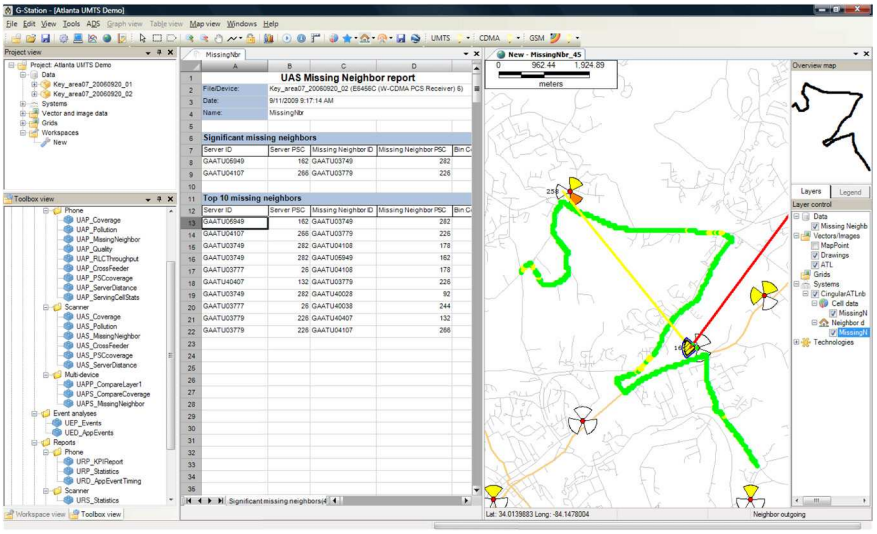


Figure 5. Example of Analysis Solution output

The optimization process embedded within Analysis Solution toolboxes is standardized, streamlined, and easily repeatable. Additionally, through the Analysis Solution's reporting engine (Custom Report Generator), the set of the toolbox analyses can be easily expanded to encompass market-specific and non-standard reports.

Optional Capabilities

Custom Design Center and Application Development Suite

The Custom Design Center (CDC) lets users create new reports and customize existing reports for output to Excel or HTML files. Each automated workflow creates a CDC report template through an intuitive graphical interface where users can drag-and-drop visualization components into a design sheet.

The Advanced Development Suite (ADS) provides command line/scripting manipulation of all reports to include more complex functions and aggregations in the reports. ADS outputs can be executed as stand-alone functions or as feeds into CDC modules.

Key CDC and ADS Features

- Create custom reports and outputs that combine data from various sources
- Automate key engineering workflow activities, including custom events through the Gladiator flexible-state machine
- Expand upon existing Gladiator functions and outputs
- Tools for product development, automation, and customization
- Develop new script and plug-in applications in any .Net-compatible console
- Scripting GUI and editor for macro creation and task automation
- Protect IP through secure licensing for OEM applications

Key CDC and ADS Benefits

- **Every customer is unique**: Create custom reports and outputs that combine data from various sources
- **Reduce OpEx**: Automate key engineering workflow activities, including custom events
- **Meet Complex Needs**: Expand upon existing functions and outputs through automation and customization
- **Improve ROI**: Develop new script and plug-in applications and automate tasks
- **Protect Engineering IP**: Customization without outsourcing

Drive Test Toolbox Analyses

E6474A-915: GSM area analyses

Phone-based	
GAP_Coverage	Locates areas where interference and coverage problems occur
GAP_Quality	Identifies areas with poor signal quality
GAP_RLCThroughput	Generates a map for evaluation of UMTS uplink and downlink RLC throughput
GAP_CrossFeeder	Identifies potential cross feeds
GAP_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage
GAP_ServingCellStatsr	Generates RF statistics for the serving cells throughout the drive

Scanner-based	
GAS_Coverage	Locates areas with poor signal levels
GAS_MissingNeighbor	Locates and identifies missing neighbors
GAS_CrossFeeder	Identifies potential cross feeds
GAS_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage

Multidevice	
GAPP_CompareLayer1	Compares Layer 1 measurements between two phones (before/after as well)
GAPS_ CompareCoverage	Compares Ec/Io and Ec measurements between two devices (phone and/or scanner) for a specific scrambling code
GAPS_BCCHcoverage	Selects the phone- or scanner-based RxLev measurements for a specific BCCH and BSIC pair

GSM event analyses

GEP_Events	Analyzes phone events
GEP_Handover	Locates and identifies neighbors with stronger signals than the serving cell-based on phone data
GED_AppEvents	Data device application events

GSM reports

GRP_KPIreport	Generates a set of user-selected phone-based CS and PS and other KPIs (a detailed list follows)
GRP_Statistics	Generates phone-based statistics
GRS_Statistics	Generates scanner-based statistics
URSys_FrequencyPlan	Verifies the frequency plan for a network and identifies potential problems

GSM utilities

GS_CreateNeighborList	Creates a neighbor list
G_Config	Toolbox configuration utility

GSM KPIs

CS domain	
GKP_CSCallEvents	Event counts and rates; setup, establishment, and termination KPIs
GKP_CSSetupTime	Call setup time
GKP_CSRF_FER	FER during calls
GKP_CSRF_RxQual	RxQual (sub) during calls
GKP_CSRF_RxLev	RxLev (sub) during calls
GKP_CSRF_TxPower	Tx power during calls
GKP_CSRF_TA	Timing advance during calls

PS domain	
GKP_PSCallEvents	Event counts and rates; setup, establishment, and termination KPIs
GKP_PSSetupTime	Call setup time
GKP_PSRF_RLCBLER	RLC BLER during calls
GKP_PSRF_RxLev	RxLev (sub) during calls
GKP_PSRF_TxPower	Tx power during calls
GKP_PSRF_DL_ RLCThroughput	Downlink RLC throughput during calls
GKP_PSRF_UL_ RLCThroughput	Uplink RLC throughput during calls
GKP_PSRF_DL_ RLCThroughputPerTS	Downlink RLC throughput per timeslot during calls
GKP_PSRF_UL_ RLCThroughputPerTS	Uplink RLC throughput per timeslot during calls

Other	
GKP_App_DL_ Throughput	Downlink application throughput
GKP_App_UL_ Throughput	Uplink application throughput
GKP_HO_Success	HO success rate
GKP_HO_Latency	HO latency

E6474A-916: UMTS HDR scanner area analyses

Scanner-based	
UAHDR_Coverage	Helps high dynamic range scanners identify areas with poor signal levels
UAHDR_ MissingNeighbor	Helps high dynamic range scanners locate and identify missing neighbors
UAHDR_Interference	Helps high dynamic range scanners identify areas where pilot pollution occurs
UAHDR_ ServerDistance	Helps high dynamic range scanners locate mobiles served by distance servers and identify servers with poor close coverage

UMTS area analyses

Phone-based	
UAP_Coverage	Locates areas where interference and coverage problems occur
UAP_MissingNeighbor	Locates and identifies missing neighbors
UAP_Pollution	Locates areas where pilot pollution occurs
UAP_PSCcoverage	Generates the Ec/Io and RSCP measurement report for a specific primary scrambling code
UAP_Quality	Locates areas with poor signal quality
UAP_RLCThroughput	Generates a map for evaluation of UMTS uplink and downlink RLC throughput
UAP_CrossFeeder	Identifies potential cross feeds
UAP_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage
UAP_ServingCellStats	Generates RF statistics for the serving cells throughout the drive

Scanner-based	
UAS_Coverage	Locates areas with poor signal levels
UAS_MissingNeighbor	Locates and identifies missing neighbors
UAS_Pollution	Locates areas where pilot pollution occurs
UAS_PSCcoverage	Generates the Ec/Io and RSCP measurement report for a specific primary scrambling code
UAS_CrossFeeder	Identifies potential cross feeds
UAS_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage

Multidevice	
UAPP_CompareLayer1	Compares Layer 1 measurements between two phones (before/after as well)
UAPS_CompareCoverage	Compares Ec/Io and Ec measurements between two devices (phone and/or scanner) for a specific scrambling code
UAPS_MissingNeighbor	Locates areas with missing neighbors from phone and scanner data and identifies them based on the blended neighbor list reported by the phone

UMTS event analyses

UEP_Events	Analyzes phone events
UED_AppEvents	Data device application events

UMTS reports

URP_KPIreport	Generates a set of user-selected phone-based CS and PS KPIs (a detailed list follows)
URP_Statistics	Generates phone-based statistics
URS_Statistics	Generates scanner-based statistics
URSys_PSCplan	Verifies the scrambling code plan for a network and identifies potential problems

UMTS utilities

US_CreateNeighborList	Creates a neighbor list
U_Config	Toolbox configuration utility

UMTS KPIs

CS domain	
UKP_CSCallEvents	Event counts and rates; setup, establishment, and termination KPIs
UKP_CSSetupTime	Call setup time
UKP_CSRF_BLER	BLER during calls
UKP_CSRF_RxPower	Rx power during calls
UKP_CSRF_TxPower	Tx power during calls
UKP_CSRF_AggEclo	Total Agg Eclo during calls.
UKP_CSRF_SIR	Average SIR during calls
UKP_CSRF_ActiveSetSize	Active set size distribution

PS domain	
UKP_PSCallEvents	Event counts and rates; setup, establishment, and termination KPIs
UKP_PSSetupTime	Call setup time
UKP_PSRF_BLER	BLER during calls
UKP_PSRF_RxPower	Rx power during calls
UKP_PSRF_TxPower	Tx power during calls
UKP_PSRF_AggEclo	Total Agg Eclo during calls.
UKP_PSRF_SIR	Average SIR during calls
UKP_PSRF_DL_RLCThroughput	Downlink RLC throughput during calls
UKP_PSRF_UL_RLCThroughput	Uplink RLC throughput during calls
UKP_PSRF_ActiveSetSize	Active set size distribution

E6474A-917: CDMA/EV-DO area analyses

Phone-based	
CAP_Coverage	Locates where interference and coverage problems occur
CAP_MissingNeighbor	Locates and identifies missing neighbors
CAP_Pollution	Locates areas where pilot pollution occurs
CAP_Quality	Locates areas with poor signal quality
CAP_RLPThroughput	Generates a map for evaluation of CDMA uplink and downlink RLP throughput
CAP_CrossFeeder	Identifies potential cross feeds.
CAP_PNcoverage	Generates the Ec/Io and Ec measurement report for a specific PN offset
CAP_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage
CAP_ServingCellStats	Generates RF statistics for the serving cells throughout the drive
EAP_Coverage	EV-DO analysis locates areas where interference and coverage problems occur
EAP_HOstate	EV-DO analysis locates areas with large active set size
EAP_ThroughputFWD	EV-DO analysis locates areas with low FWD throughput

EAP_ThroughputRVS	EV-DO analysis locates areas with low RVS throughput
EAP_CrossFeeder	EV-DO analysis locates potential cross feeds
EAP_ServerDistance	EV-DO analysis locates areas where mobiles are served by distance servers and identifies servers with poor close coverage

Scanner-based	
CAS_Coverage	Locates areas with poor signal levels
CAS_Pollution	Locates areas where pilot pollution occurs
CAS_MissingNeighbor	Locates and identifies missing neighbors
CAS_CrossFeeder	Identifies potential cross feeds
CAS_PNcoverage	Generates the Ec/Io and Ec measurement report for a specific PN offset
CAS_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage

Multidevice	
CAPP_CompareLayer1	Compares Layer 1 measurements between two phones (before/after as well)
CAPS_ CompareCoverage	Compares Ec/Io and Ec measurements between two devices for a specific PN offset
EAPP_CompareLayer1	EV-DO analysis compares Layer 1 measurements between two phones (before/after as well)
EAPP_CompareRevA	EV-DO analysis compares RevA measurements between two phones (before/after as well)

CDMA/EV-DO event analyses

CEP_Events	Analyzes phone events
CED_AppEvents	Data device application events
EED_AppEvents	EV-DO device application events

CDMA/EV-DO reports

CRP_KPIreport	Generates a set of user-selected phone-based CS and PS and other KPIs (a detailed list follows)
CRP_Statistics	Generates phone-based statistics
CRD_AppEventTiming	Generates a report evaluating application event timing
ERP_SINRvDRC	Generates calculates the EV-DO SINR distribution based on DRC rate
ERP_Statistics	Generates phone-based EV-DO statistics
ERP_RevAStatistics	Generates phone-based RevA statistics
CRS_Statistics	Generates scanner-based statistics
CRSys_PNplan	Verifies the PN plan for a network and identifies potential problems

CDMA/EV-DO utilities

CS_CreateNeighborList	Creates a neighbor list
C_Config	Toolbox configuration utility

CDMA/EV-DO KPIs

CS domain	
CKP_CSCallEvents	Event counts and rates; setup, establishment, and termination KPIs
CKP_CSSetupTime	Call setup time
CKP_CSRF_FER	FER during calls
CKP_CSRF_RxPower	Rx power during calls
CKP_CSRF_TxPower	Tx power during calls
CKP_CSRF_AggEclo	Total Agg Eclo during calls.
CKP_CSRF_ActiveSetSize	Active set size distribution

PS domain	
CKP_PSCallEvents	Event counts and rates; setup, establishment, and termination KPIs
CKP_PSSetupTime	Call setup time
CKP_PSRF_FER	FER during calls
CKP_PSRF_RxPower	Rx power during calls
CKP_PSRF_TxPower	Tx power during calls
CKP_PSRF_AggEclo	Total Agg Eclo during calls
CKP_PSRF_FWD_ RLPThroughput	Fwd RLP throughput during calls
CKP_PSRF_REV_ RLPThroughput	Rev RLP throughput during calls
UKP_PSRF_UL_ RLCThroughput	Uplink RLC throughput during calls
CKP_PSRF_ ActiveSetSize	Active set size distribution

Application	
CKP_App_DL_ Throughput	Downlink application throughput
CKP_App_UL_ Throughput	Uplink application throughput

E6474A-918: WiMAX area analyses

Phone-based	
WAP_Coverage	Locates where interference and coverage problems occur
WAP_Throughput	Generates a map for evaluation of uplink and downlink throughput
WAP_CrossFeeder	Identifies potential cross feeds
WAP_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage
WAP_ServingCellStats	Generates RF statistics for the serving cells throughout the drive

Scanner-based	
WAS_Coverage	Locates areas with poor signal levels
WAS_MissingNeighbor	Locates and identifies missing neighbors
WAS_Cellcoverage	Generates coverage measurement report for a specific frequency and physical cell ID
WAS_CrossFeeder	Identifies potential cross feeds
WAS_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage

Multidevice	
WAPP_CompareLayer1	Compares Layer 1 measurements between two phones (before/after as well)

WiMAX event analyses

WED_VoIPEvents	Analyzes data device VoIP events
WED_AppEvents	Data device application events

WiMAX reports

WRP_KPIreport	Generates a set of user-selected KPIs (a detailed list follows)
WRP_Statistics	Generates a phone-based statistical report
WRD_AppEventTiming	Generates a report evaluating application event timing
WRSys_PreamblePlan	Verifies the preamble plan for a network and identifies potential problems

WiMAX utlilties

WS_ CreateNeighborList	Creates a neighbor list
W_Config	Toolbox configuration utility

WiMAX KPIs

WKP_RF_RxPower	Rx power
WKP_RF_TxPower	Tx power
WKP_RF_CINR	CINR
WKP_RF_DL_Rate	DL rate
WKP_RF_UL_Rate	UL rate
WKP_HO_Success	HO success rate
WKP_HO_Latency	HO latency
WKP_VS_VideoMOS	Streaming video: video MOS
WKP_VS_AudioMOS	Streaming video: audio MOS
WKP_VoIPCallEvents	VoIP call events
WKP_App_DL_ Throughput	Downlink application throughput
WKP_App_UL_ Throughput	Uplink application throughput

E6474A-919: LTE area analyses

Phone-based	
LAP_Coverage	Locates areas where interference and coverage problems occur
LAP_MissingNeighbor	Locates and identifies missing neighbors
LAP_Cellcoverage	Generates a coverage measurement report for a specific frequency and physical cell ID considering PCI reuse and cell tiers
LAP_Quality	Locates areas with poor downlink quality
LAP_Throughput	Generates a map for evaluation of uplink and downlink throughput
LAP_CrossFeeder	Identifies potential cross feeds
LAP_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage
LAP_ServingCellStats	Generates RF statistics for the serving cells throughout the drive

Scanner-based	
LAS_Coverage	Locates areas with poor signal levels
LAS_MissingNeighbor	Locates and identifies missing neighbors
LAS_Cellcoverage	Generates coverage measurement report for a specific frequency and physical cell ID considering PCI reuse and cell tiers
LAS_CrossFeeder	Identifies potential cross feeds
LAS_ServerDistance	Locates mobiles served by distance servers and identifies servers with poor close coverage

Multidevice	
LAPP_CompareLayer1	Compares Layer 1 measurements between two phones (before/after as well)
LAPS_ CompareCoverage	Compares coverage between phone and scanner measurements

LTE event analyses

LEP_Events	Analyzes phone events
LED_AppEvents	Data device application events
LRP_AbnormalEvents	(Access Failure and Handover Failure) with additional indicator "Location in the Call Flow"
LRP_AttachSummary	Provides PS KPIs for each attach/detach context period

LTE reports

LRP_KPIreport	Generates a set of user-selected phone-based KPIs (a detailed list follows)
LRD_AppEventTiming	Generates a report evaluating application event timing
LRP_Statistics	Generates a phone-based statistical report
LRS_Statistics	Generates a scanner-based statistical report

LTE utlilties

LS_CreateNeighborList	Creates a neighbor list
L_Config	Toolbox configuration utility

LTE KPIs

LKP_PS_CallEvents
LKP_PS_SetupTime
LKP_RF_RxPower
LKP_RF_TxPower
LKP_RF_RSRQ
LKP_RF_RSRP
LKP_RF_EsNO
LKP_RF_BLER
LKP_RF_CW0_BLER
LKP_RF_CW1_BLER
LKP_RF_Rank1_CQI
LKP_RF_Rank2_CW0_CQI
LKP_RF_Rank2_CW1_CQI
LKP_RF_DL_MAC_Throughput
LKP_RF_UL_MAC_Throughput
LKP_RF_DL_PDCP_Throughput
LKP_RF_UL_PDCP_Throughput
LKP_RF_DL_PDSCH_Throughput
LKP_RF_UL_PUSCH_Throughput
LKP_RF_DL_CW0_PDSCH_Throughput
LKP_RF_DL_CW1_PDSCH_Throughput
LKP_RF_DL_RLC_Throughput
LKP_RF_UL_RLC_Throughput
LKP_App_DL_Throughput
LKP_App_UL_Throughput
LKP_App_DL_IP_Throughput
LKP_App_UL_IP_Throughput
LKP_VS_VideoMOS
LKP_VS_AudioMOS
LKP_HO_Success
LKP_HO_Latency

Computing Platform

PC specifications

Gladiator can run on the same PC as the JDSU Drive Test solution; however, when installed on a stand-alone PC, these recommended specifications apply.

Minimum	
CPU	Intel® i5® 1.8 GHz processor or equivalent
Memory	4GB RAM
Free disk space for G-Station files	2GB
Free disk space for data (project files)	10GB

Recommended	
CPU	Intel® i7® 2.2 GHz processor or equivalent
Memory	8GB RAM
Free disk space for G-Station files	2GB
Free disk space for data (project files)	50GB
Software requirements	Microsoft® Windows™ 2008 SP2, Microsoft Windows™ Vista SP2, Windows 7

Product Configuration

Two ordering options are available: individually via the options on Tables 1 and 2 or via the bundled options in Table 3. The Analysis Solution software options shown in Table 1 let you create post-processing configurations that are suitable for particular optimization needs.

Part Number	Description
E6474A-910	Analysis Solution including Custom Design Center (CDC)

Table 1. Analysis Solution configuration options

The Analysis Solution needs at least one of the technology-based toolbox licenses in Table 2 in order to run.

Part Number	Description
E6474A-915	GSM/GPRS/EDGE Technology Toolbox License
E6474A-916	UMTS/HSPA Technology Toolbox License
E6474A-917	CDMA2000/1xEV-DO Technology Toolbox License
E6474A-918	WiMAX Technology Toolbox License
E6474A-919	LTE Technology Toolbox License

Table 2. Toolbox options

These technology-based toolbox licenses provide protocol decoder and pre-defined reports for the chosen technology.

The Custom Design Center (CDC) lets you create custom reports through an easy-to-use GUI that can be output in Excel format.

These product bundles include the indicated generic options.

Part Number	Description
E6474A-PP1	Gladiator Post-Processing Solution for GSM/GPRS/EDGE/UMTS (This option includes E6474A-910, 915, 916)
E6474A-PP2	Gladiator Post-Processing Solution for GSM/GPRS/EDGE/UMTS/LTE (This option includes E6474A-910, 915, 916, 919)
E6474A-PP3	Gladiator Post-Processing Solution for CDMA/EVDO/LTE (This option includes E6474A-910, 917, 919)

Table 3. Product bundle options

Test & Measurement Regional Sales

NORTH AMERICA
TOLL FREE: 1 855 ASK-JDSU
1 855 275-5378

LATIN AMERICA
TEL: +1 954 688 5660
FAX: +1 954 345 4668

ASIA PACIFIC
TEL: +852 2892 0990
FAX: +852 2892 0770

EMEA
TEL: +49 7121 86 2222
FAX: +49 7121 86 1222

www.jdsu.com/test