

Redline Management Suite (RMS)

Features:

- Standards-based, carrier-class solution
- Self-Contained Subscriber Provisioning for Fixed & Nomadic services
- Integration with OSS/BSS via Northbound Interface – CORBA & SOAP
- Inventory Management & Reporting
- SQL Database Included
- Comprehensive FCAPS Support with Reporting
- High Availability Servers
- Full Scalability

System Recommendations:

- Windows Server 3GHz, dual CPU, 4 GB (small < 5,000 NE's)
(Requires Windows 2003 server enterprise edition to use more than 1.xGB)
- Solaris 10, SUN Netra T2000, 1.2 GHz UltraSPARC, 8 GB RAM (medium <15,000 NE's)
- Solaris 10, SUN Netra T2000, 1.2 GHz UltraSPARC, 16 GB RAM (large <25,000 NE's)
- Solaris 10, SUN Netra T2000, 1.2 GHz UltraSPARC, 32 GB RAM (x-large <75,000 NE's)

Network Element Name	Connection State	IP	MAC	UpTime	Type	Active SW Version	Serial Number
ims@Simpson	connected	192.168.11.11	00:09:02:00:89:b0	5d 22:28:21	AN100u	1.2.11	3024-0100-0
1_1_AN100u_2_RuTf4	connected	192.168.11.182	00:09:02:00:7e:a3	30d 01:04:47	AN100u	1.1.16	3024-0005-0
1_1_AN100u_4_imo_jeat	connected	192.168.11.9	00:09:02:00:cd:3a	12d 04:41:24	AN100u	1.1.16	3024-0105-0
1_2_AN100u_4_imo_jeat	connected	192.168.11.15	00:09:02:00:c0:bd	12d 02:11:05	AN100u	1.2.9	3024-0105-0
Alpha_ITC2	connected	192.168.20.100	00:09:02:00:a3:5d	1d 00:08:10	AN100u	1.2.11	3024-0104-0
AN-801_PMP_master	connected	192.168.11.18	00:09:02:00:a3:47	2d 18:02:50	AN801PMP	10.00.076	3002-0100-0
AN-801_PTP_master	connected	192.168.11.7	00:09:02:00:ce:4c	15d 09:47:21	AN801PTP	2.10.027	3202-0100-0
AN-801_PTP_slave	connected	192.168.11.8	00:09:02:00:ce:4b	15d 09:38:08	AN801PTP	2.10.027	3202-0100-0
Device "Redmax" WIMAX	connected	192.168.11.3	00:09:02:00:7e:aa	28d 06:42:39	AN100u	1.0.73	3024-0005-0
ITC	connected	192.168.20.94	00:09:02:00:af:f9	1d 00:08:10	AN100u	1.2.11	3024-0104-0
Marsala-SS1	connected	192.168.20.97	00:09:02:00:85:c1	3d 02:50:53	AN100u	1.1.20	3024-0100-0
Ridha	connected	192.168.20.96	00:09:02:00:89:94	1d 00:08:10	AN100u	1.2.11	3024-0100-0
Violeta rules	connected	192.168.11.50	00:09:02:00:89:98	28d 06:42:27	AN100u	2.0.1.1 Debug	3202-0001-0

Redline's award-winning Management Suite (RMS) is a sophisticated element management solution. It gives broadband network operators the ability to easily deploy, control, monitor and upgrade their Redline components network-wide through an intuitive, user-friendly Graphical User Interface (GUI). Redline's RMS acts as a gateway between the Redline equipment in the network and the Network Management System (NMS) and Operational Support System/Billing Support System (OSS/BSS), enabling full system automation.

Network management is a top priority for service providers and private and enterprise network operators. An efficient, centralized management system that enables network operators to manage and monitor their systems from one location, can help companies significantly reduce the cost of operating their networks, improve customer satisfaction and enhance their ability to deliver advanced IP services.

The Redline RMS monitors network elements, collects traffic statistics, provisions services and integrates the existing NMS with the Element Management System (EMS). It also enables operators to perform software upgrades to all Redline equipment on the network from a central location while providing multi-level access security.

To help ensure uninterrupted services and to maximize the traffic on the network, the Redline RMS includes programmable Threshold Crossing Alerts (TCA's) for varying levels of alarm severity. The tool also incorporates a Northbound Interface (NBI) for provisioning including services, reporting inventory and alarm propagation.

The Redline RMS is a critical piece in the total telecommunications-management solution. It is built from the ground up to support a whole new generation of WiMAX standardized products including Redline's RedMAX 4C family of products. Redline's RMS takes into account new carrier and service provider requirements for performance, scalability, new all-IP WiMAX architectures, and the on-going operational challenges they face.

Redline Management Suite (RMS) Operation and Features

Elements Supported

- RedMAX
- RedMAX 4C
- RedCONNEX

Networking and Communication

- TCP/IP Interfaces
- Web Based
- CORBA / IDC (NBI: TMF 814 v.3)
- Web Services / SOAP
- SNMP
- Trap forwarding via SNMP NBI

Platforms and Technologies

- J2EE
- Web Based Client (IE and Firefox)
- Solaris 10 server
- Windows 2003 Server
- SQL Database
- High Availability
- Concurrent Users: 25
- Number of Elements/Server:
up to 75,000 *

*depends on hardware and operating system

OA&M

- Reporting
 - PDF, RTF, CSV Formats
 - Scheduled Email
- Log generation and administration
- Backup and Restore of Database

Configuration Management

- Auto Discovery of Network Elements
- Service Class Bundles
- Service Flow Bundles
- Pre-provisioning
- Provisioning Classifications (VLAN, DSCP, IP, etc.)

Fault Management

- X.733 ITU-T based Alarm
- Alarm filtering
- Alarm Severity Assignment Profiles
- Alarm Configuration
- Alarm Types with Threshold Crossing Alerts (TCA)

Subscriber Unit Provisioning

- Self-contained Pre-provisioning
- DHCP Proxy or SNMP Trap Sector Activation
- Northbound Interface for Integration to OSS

Security Management

- Role Definitions
- User Login Tracking
- User Sessions Logging
- User Authentication Management
- Password & User Policies
- Multi-user & Activity Logging

Performance Management

- Performance Threshold Crossing Alerts
- Key Performance Indicators Dashboard
- Retrieval of performance monitoring and traffic data
- Service Flow and Radio statistics
- Full 802.16-2004 Support
- Full 802.16-2005 Support

Inventory Management

- Element Software Upgrades & Scheduling
- Image Management
- Element Configuration Backup & Restore

RedCARE Support

Reliable broadband wireless connectivity requires dependable equipment and around-the-clock access to network engineering expertise. Redline's RedCARE program delivers outstanding support through a dedicated Certified Partner community. These Partners ensure that Redline products operate at exceptional performance levels and services are delivered to the highest networking standards possible.

Redline's global network of Certified Partners provide responsive customer and solution support everywhere Redline's products are available. Redline's experienced support engineers and service experts ensure that you get the help you need – when you need it most.

About Redline Communications

Redline Communications is the leading provider of fixed and mobile standards-based wireless broadband solutions. Redline's RedMAX™ WiMAX Forum Certified™ system, RedMAX 4C Mobile WiMAX™ products, and its award-winning broadband wireless infrastructure family of products – RedCONNEX™ and RedACCESS™ – enable service providers and other network operators to cost-effectively deliver high-bandwidth services, including voice, video and data communications. Redline is committed to maintaining its wireless industry leadership with the continued development of WiMAX and other advanced wireless broadband products. With more than 75,000 installations in 80 countries, and a global network of over 140 partners, Redline's experience and expertise helps service providers, enterprises and government organizations roll out wireless broadband networks to support advanced communications.

