Network Working Group
Request for Comments: 2500
Obsoletes: 2400, 2300, 2200, 2000, 1920, 1880,
1800, 1780, 1720, 1610, 1600, 1540, 1500, 1410,
1360, 1280, 1250, 1200, 1140, 1130, 1100, 1083
STD: 1
Category: Standards Track

Internet Engineering Task Force
J. Reynolds
R. Braden
Editors
June 1999

Internet Official Protocol Standards

Status of this Memo

This memo describes the state of standardization of protocols used in the Internet as determined by the Internet Engineering Task Force (IETF). This memo is an Internet Standard. Distribution of this memo is unlimited.

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Table of Contents

1. Introduction

This memo summarizes the status of Internet protocols and specifications. It is published by the RFC Editor in accordance with Section 2.1 of "The Internet Standards Process -- Revision 3", RFC 2026, which specifies the rules and procedures by which all Internet stnadards are set. This memo is prepared by the RFC Editor for the IESG and IAB. It is a member of a series of summary memos that are published approximately every one hundred RFCs; please see www.rfc-editor.org.

This memo lists the level and status of the archival documents known as RFCs (Request for Comments) within the Internet standards process. The reader is urged to review RFC 2026 for essential context for interpreting this memo.

The following introductory text is quoted directly from RFC 2026:

> "The Internet, a loosely-organized international collaboration of autonomous, interconnected networks, supports host-to-host communication through voluntary adherence to open protocols and procedures defined by Internet Standards. There are also many isolated interconnected networks, which are not connected to the global Internet but use the Internet Standards.
>
> The Internet Standards Process described in this document is concerned with all protocols, procedures, and conventions that are used in or by the Internet, whether or not they are part of the TCP/IP protocol suite. In the case of protocols developed and/or standardized by non-Internet organizations, however, the Internet Standards Process normally applies to the application of the protocol or procedure in the Internet context, not to the specification of the protocol itself.
>
> In general, an Internet Standard is a specification that is stable and well-understood, is technically competent, has multiple, independent, and interoperable implementations with substantial operational experience, enjoys significant public support, and is recognizably useful in some or all parts of the Internet.
>
> Each distinct version of an Internet standards-related specification is published as part of the "Request for Comments" (RFC) document series. This archival series is the official publication channel for Internet standards documents and other publications of the IESG, IAB, and Internet community. RFCs can be obtained from a number of Internet hosts using anonymous FTP, gopher, World Wide Web, and other Internet document-retrieval systems.

The rules for formatting and submitting an RFC are defined in [5]. Every RFC is available in ASCII text. Some RFCs are also available in other formats. The other versions of an RFC may contain material (such as diagrams and figures) that is not present in the ASCII version, and it may be formatted differently.

```
**********************************************************
*                                                        *
*  A stricter requirement applies to standards-track     *
*  specifications:  the ASCII text version is the        *
*  definitive reference, and therefore it must be a      *
*  complete and accurate specification of the standard,  *
*  including all necessary diagrams and illustrations.   *
*                                                        *
**********************************************************
```

The status of Internet protocol and service specifications is summarized periodically in an RFC entitled "Internet Official Protocol Standards" [1]. This RFC shows the level of maturity and other helpful information for each Internet protocol or service specification (see section 3).

Specifications subject to the Internet Standards Process fall into one of two categories: Technical Specification (TS) and Applicability Statement (AS).

Some RFCs document Internet Standards. These RFCs form the "STD" subseries of the RFC series [4]. When a specification has been adopted as an Internet Standard, it is given the additional label "STDxxx", but it keeps its RFC number and its place in the RFC series. (see section 4.1.3)

Some RFCs standardize the results of community deliberations about statements of principle or conclusions about what is the best way to perform some operations or IETF process function. These RFCs form the specification has been adopted as a BCP, it is given the additional label "BCPxxx", but it keeps its RFC number and its place in the RFC series. (see section 5)

Not all specifications of protocols or services for the Internet should or will become Internet Standards or BCPs. Such non-standards track specifications are not subject to the rules for Internet standardization. Non-standards track specifications may be published directly as "Experimental" or "Informational" RFCs at the discretion of the RFC Editor in consultation with the IESG (see section 4.2)."

Section 2 of this memo lists all Technical Specification RFCs that are in the standards track, and Section 3 lists Applicability Statement RFCs in the standards track. Section 4 lists those protocol specification RFCs that are off the standards track (Informational and Historic status). This memo does not list Informational RFCs that may be of general interest to the community but do not specify protocols for the Internet. It also does not list BCP RFCs. Telnet options have been added into the lists.

2. Current Technical Specifications

Subsections 2.1-2.5 list the standards in groups by protocol state. In the following lists, shorthand nicknames have been shown for many of the major protocols. These names are commonly used in discourse on Internet mailing lists.

2.1. Standard Protocols

Protocol	Name	RFC	STD	*
--------	Internet Official Protocol Standards	2500	1	
--------	Assigned Numbers	1700	2	
IP	Internet Protocol	791	5	
	as amended by:--------			
--------	IP Subnet Extension	950	5	
--------	IP Broadcast Datagrams	919	5	
--------	IP Broadcast Datagrams with Subnets	922	5	
ICMP	Internet Control Message Protocol	792	5	
IGMP	Internet Group Multicast Protocol	1112	5	
UDP	User Datagram Protocol	768	6	
TCP	Transmission Control Protocol	793	7	
TELNET	Telnet Protocol	854,855	8	
FTP	File Transfer Protocol	959	9	
SMTP	Simple Mail Transfer Protocol	821	10	
SMTP-SIZE	SMTP Service Ext for Message Size	1870	10	
SMTP-EXT	SMTP Service Extensions	1869	10	
MAIL	Format of Electronic Mail Messages	822	11	
NTPV2	Network Time Protocol (Version 2)	1119	12	
DOMAIN	Domain Name System	1034,1035	13	
DNS-MX	Mail Routing and the Domain System	974	14	
SNMP	Simple Network Management Protocol	1157	15	
SMI	Structure of Management Information	1155	16	
Concise-MIB	Concise MIB Definitions	1212	16	
MIB-II	Management Information Base-II	1213	17	
NETBIOS	NetBIOS Service Protocols	1001,1002	19	
ECHO	Echo Protocol	862	20	
DISCARD	Discard Protocol	863	21	
CHARGEN	Character Generator Protocol	864	22	
QUOTE	Quote of the Day Protocol	865	23	
USERS	Active Users Protocol	866	24	
DAYTIME	Daytime Protocol	867	25	
TIME	Time Server Protocol	868	26	
TOPT-BIN	Binary Transmission	856	27	
TOPT-ECHO	Echo	857	28	
TOPT-SUPP	Suppress Go Ahead	858	29	
TOPT-STAT	Status	859	30	
TOPT-TIM	Timing Mark	860	31	
TOPT-EXTOP	Extended-Options-List	861	32	
TFTP	Trivial File Transfer Protocol	1350	33	
TP-TCP	ISO Transport Service on top of the TCP	1006	35	
ETHER-MIB	Ethernet MIB	1643	50	
PPP	Point-to-Point Protocol (PPP)	1661	51	
PPP-HDLC	PPP in HDLC Framing	1662	51	
IP-SMDS	IP Datagrams over the SMDS Service	1209	52	

POP3	Post Office Protocol, Version 3	1939	53
OSPF2	Open Shortest Path First Routing V2	2328	54
IP-FR	Multiprotocol over Frame Relay	2427	55*
RIP2	RIP Version 2-Carrying Additional Info.	2453	56*
RIP2-APP	RIP Version 2 Protocol App. Statement	1722	57*
SMIv2	Structure of Management Information v2	2578	58*
CONV-MIB	Textual Conventions for SNMPv2	2579	58*
CONF-MIB	Conformance Statements for SNMPv2	2580	58*

[Note: an asterisk at the end of a line indicates a change from the previous edition of this document.]

2.2. Network-Specific Standard Protocols

Protocol	Name	RFC	STD *
IP-ATM	Classical IP and ARP over ATM	2225	
ATM-ENCAP	Multiprotocol Encapsulation over ATM	1483	
IP-TR-MC	IP Multicast over Token-Ring LANs	1469	
IP-FDDI	Transmission of IP and ARP over FDDI Net	1390	36
IP-X.25	X.25 and ISDN in the Packet Mode	1356	
ARP	Address Resolution Protocol	826	37
RARP	A Reverse Address Resolution Protocol	903	38
IP-ARPA	Internet Protocol on ARPANET	BBN1822	39
IP-WB	Internet Protocol on Wideband Network	907	40
IP-E	Internet Protocol on Ethernet Networks	894	41
IP-EE	Internet Protocol on Exp. Ethernet Nets	895	42
IP-IEEE	Internet Protocol on IEEE 802	1042	43
IP-DC	Internet Protocol on DC Networks	891	44
IP-HC	Internet Protocol on Hyperchannel	1044	45
IP-ARC	Transmitting IP Traffic over ARCNET Nets	1201	46
IP-SLIP	Transmission of IP over Serial Lines	1055	47
IP-NETBIOS	Transmission of IP over NETBIOS	1088	48
IP-IPX	Transmission of 802.2 over IPX Networks	1132	49
IP-HIPPI	IP over HIPPI	2067	

[Note: an asterisk at the end of a line indicates a change from the previous edition of this document.]

2.3. Draft Standard Protocols

Protocol	Name	RFC
VACM-SNMP	View-based Access Control Model for SMMP	2575*
USM-SNMPV3	User-based Security Model for SNMPv3	2574*
SNMP-APP	SNMP Applications	2573*
MPD-SNMP	Message Processing & Dispatching SNMP	2572*
ARCH-SNMP	Architecture Describing SNMP Management Frameworks	2571*
ICMPv6	ICMPv6 for IPv6	2463*
IPV6-AUTO	IPv6 Stateless Address Autoconfiguation	2462*
IPV6-ND	Neighbor Discovery for IP Version 6	2461*
IPV6	IPv6 Specification	2460*
URI-GEN	URI: Generic Syntax	2396
IARP	Inverse Address Resolution Protocol	2390
TN3270E	Telnet Option - TN3270 Enhancements	2355*
TFTP-Opt	TFTP Options	2349
TFTP-Blk	TFTP Blocksize Option	2348
TFTP-Ext	TFTP Option Extension	2347
ONE-PASS	One-Time Password System	2289
SMTP-Pipe	SMTP Serv. Ext. for Command Pipelining	2197
DHCP-BOOTP	DHCP Options and BOOTP Extensions	2132
DHCP	Dynamic Host Configuration Protocol	2131
FRAME-MIB	Management Information Base for Frame	2115
-------	Clarifications and Extensions BOOTP	1542
DHCP-BOOTP	Interoperation Between DHCP and BOOTP	1534
BOOTP	Bootstrap Protocol	951,2132
MIME-CONF	MIME Conformance Criteria	2049
MIME-MSG	MIME Msg Header Ext for Non-ASCII	2047
MIME-MEDIA	MIME Media Types	2046
MIME	Multipurpose Internet Mail Extensions	2045
PPP-CHAP	PPP Challenge Handshake Authentication	1994
PPP-MP	PPP Multilink Protocol	1990
PPP-LINK	PPP Link Quality Monitoring	1989
COEX-MIB	Coexistence between SNMPV1 & SNMPV2	1908
SNMPv2-MIB	MIB for SNMPv2	1907
TRANS-MIB	Transport Mappings for SNMPv2	1906
OPS-MIB	Protocol Operations for SNMPv2	1905
CON-MD5	Content-MD5 Header Field	1864
OSPF-MIB	OSPF Version 2 MIB	1850
STR-REP	String Representation ...	1779
X.500syn	X.500 String Representation ...	1778
X.500lite	X.500 Lightweight ...	1777
BGP-4-APP	Application of BGP-4	1772
BGP-4	Border Gateway Protocol 4	1771
PPP-DNCP	PPP DECnet Phase IV Control Protocol	1762
RMON-MIB	Remote Network Monitoring MIB	1757
802.5-MIB	IEEE 802.5 Token Ring MIB	1748

RIP2-MIB	RIP Version 2 MIB Extension	1724
SIP-MIB	SIP Interface Type MIB	1694
-------	Def Man Objs Parallel-printer-like	1660
-------	Def Man Objs RS-232-like	1659
-------	Def Man Objs Character Stream	1658
BGP-4-MIB	BGP-4 MIB	1657
SMTP-8BIT	SMTP Service Ext or 8bit-MIMEtransport	1652
OSI-NSAP	Guidelines for OSI NSAP Allocation	1629
ISO-TS-ECHO	Echo for ISO-8473	1575
DECNET-MIB	DECNET MIB	1559
BRIDGE-MIB	BRIDGE-MIB	1493
NTPV3	Network Time Protocol (Version 3)	1305
FINGER	Finger Protocol	1288
IP-MTU	Path MTU Discovery	1191
TOPT-LINE	Linemode	1184
NICNAME	WhoIs Protocol	954

[Note: an asterisk at the end of a line indicates a change from the previous edition of this document.]

2.4. Proposed Standard Protocols

Protocol	Name	RFC
--------	PKIX Operational Protocols: FTP and HTTP	2585*
--------	APPN/HPR in IP Networks MIB	2584*
TCP-CC	TCP Congestion Control	2581*
APP-MIB	Application Management MIB	2564*
--------	DHCP Auto-Configuration Option	2563*
--------	TN3270E-RT-MIB	2562*
--------	TN3270E Using SMIv2 MIB	2561*
--------	Internet X.509 Public Key Infra. Op. Proto. LDAPv2	2559*
--------	SONET/SDH Interface Type MIB	2558*
MHTML	MIME Encap. of Aggregate Documents, such as HTML	2557*
--------	SMTP Service Extension for Authentication	2554*
--------	Use of BGP-4 Multipro. Ext. for IPv6 IDR	2545*
SIP	Session Initiation Protocol	2543*
DHK-DNS	Storage of Diffie-Hellman Keys in DNS	2539*
SC-DNS	Storing Certificates in the DNS	2538*
--------	RSA/MD5 KEYs and SIGs in the DNS	2537*
--------	DSA KEYs and SIGs in the DNS	2536*
DNS-SECEXT	Domain Name System Security Extensions	2535*
--------	Media Features for Display, Print, Fax	2534*
--------	Transmission of IPv6 Packets over IPv4	2529*
--------	Reserved IPv6 Subnet Anycast Addresses	2526*
WEBDAV	HTTP Ext. for Distributed Authoring	2518*
ATM-MIBMAN	MIB for ATM Management	2515*
ATM-TC-OID	ATM Textual Conventions and OIDs	2514*
--------	Connection-Oriented Accounting MIB	2513*
--------	Accounting Information for ATM Networks	2512*
X.509-CRMF	Internet X.509 CRMF	2511*
PKICMP	Internet X.509 PKI CMP	2510*
IPCOM-PPP	IP Header Compression over PPP	2509*
--------	Compressing IP/UDP/RTP Headers	2508*
--------	IP Header Compression	2507*
--------	IPv6 Datagrams on ARCnet	2497*
DS3-E3-MIB	DS3/E3 Interface Type MIB	2496*
--------	DS1/E1/DS2/E2 MIB	2495*
--------	DSO MIB / DSOBUNDLE MIB	2494*
--------	15 Minute Based Performance History TCs	2493*
IPv6ATMNET	IPv6 over ATM Networks	2492*
IPv6-NBMA	IPv6 over Non-Broadcast Multiple Access	2491*
--------	SMTP Serv. Ext. for Secure SMTP over TLS	2487*
NAI	Network Access Identifier	2486*
--------	DCHP Option for the Open Group’s UAP	2485*
--------	PPP LCP Internationalization Option	2484*
--------	Gateways and MIME Security Multiparts	2480*
--------	GSS-API Negotiation Mechanism	2478*

--------	Message Submission	2476*
DIFFSRV	Architecture for Differentiated Service	2475*
--------	Differentiated Services Field	2474*
--------	Generic Packet Tunneling in IPv6	2473*
IPv6-PPP	IP Version 6 over PPP	2472*
--------	IPv6 Packets over Token Ring Networks	2470*
--------	IPv6 Packets over FDDI Networks	2467*
ICMPv6-MIB	ICMPv6 Group MIB	2466*
--------	Textual Conventions, General Group MIB	2465*
--------	IPv6 Packets over Ethernet Networks	2464*
--------	Internet X.509 Public Key Infrastructure	2459*
EBN-MIB	Extended Border Node MIB	2457*
--------	APPN TRAPS MIB	2456*
APPN-MIB	APPN MIB	2455*
--------	UDP MIB for IPv6	2454*
--------	TCP MIB for IPv6	2452*
--------	ESP CBC-Mode Cipher Algorithms	2451*
POP3-EXT	POP3 Extension Mechanism	2449*
IMIP	iCalendar Message-Based Interoperability	2447*
ITIP	iCalendar Message-Based Interoperability	2446*
ICALENDAR	Internet Calendaring, Scheduling Core..	2445*
OTP-SASL	OTP SASL Mechanism	2444*
--------	OpenPGP Message Format	2440*
--------	BGP Route Flap Damping	2439*
--------	RTP Payload Format for JPEG-compressed Video	2435*
--------	RTP Payload Format for BT.656 Video Encoding	2431*
--------	RTP Payload Format for H.263+	2429*
--------	FTP Extensions for IPv6 and NATs	2428
MIME-VCARD	vCard MIME Directory Profile	2426
TXT-DIR	MIME Content-Type for Directory Info	2425
CONT-DUR	Content-Duration MIME Header	2424
MIME-VPIM	VPIM Voice Message	2423
MIME-ADPCM	Toll Quality Voice - 32 kbit/s ADPC	2422
MIME-VP2	Voice Profile for Internet Mail V2	2421
--------	Multicast/UNI 3.0/3.1 based ATM MIB	2417
--------	NULL Encryption Algorithm and Its Use With IPsec	2410*
IKE	The Internet Key Exchange	2409*
ISAKMP	Internet Security Association and Key Management Pro.	2408*
ISAKMPSEC	IP Security Domain of Interpretation for ISAKMP	2407*
ESP	IP Encapsulating Security Payload	2406*
ESPDES-CBC	ESP DES-CBC Cipher Algorithm With Explicit IV	2405*
--------	Use of HMAC-SHA-1-96 within ESP and AH	2404*
--------	Use of HMAC-MD5-96 within ESP and AH	2403*
IP-AUTH	IP Authentication Header	2402*
IPSEC	Security Architecture for the Internet Protocol	2401*
DATA-URL	"data" URL scheme	2397
CIDMID-URL	Content-ID and Message-ID URLs	2392
IPCOMP	IP Payload Compression Protocol	2393*

FTP-FNEGO	Feature negotiation mechanism for FTP	2389
--------	MIME Multipart/form-data	2388
MIME-RELAT	MIME Multipart/Related Content-type	2387
--------	Protection of BGP Sessions via TCP MD5	2385
POP-URL	POP URL Scheme	2384
--------	Interoperation of CLS and GS with ATM	2381
--------	RSVP over ATM Imple. Requirements	2380
--------	IPv6 Aggreg. Global Unicast Addr. Format	2374
--------	IPv6 Addressing Architecture	2373
TIPV3	Transaction Internet Protocol V3	2371
OSPF-LSA	OSPF Opaque LSA Option	2370
--------	Use of URLs as Meta-Syntax...	2369
URLMAILTO	mailto URL scheme	2368
PPP-AAL	PPP Over AAL	2364
PPP-FUNI	PPP Over FUNI	2363
IMAP4UIDPL	IMAP4 UIDPLUS Extension	2359
--------	Ethernet-like Interface Types MIB	2358
MOBILIPREV	Reverse Tunneling for Mobile IP	2344
IMAP4NAME	IMAP4 Namespace	2342
VRRP	Virtual Router Redundancy Protocol	2338
NHRP-SCSP	Distributed NHRP Service Using SCSP	2335
SCSP	Server Cache Synchronization Protocol	2334
NHRP	NBMA Next Hop Resolution Protocol	2332
UNI-SIG	ATM Sig Support (IPOA) UNI Signalling	2331
SDP	Session Description Protocol	2327
RTSP	Real Time Streaming Protocol	2326
IPOA-MIB	Classical IP and ARP Over ATM MIB	2320
DNS-NCACHE	Negative Caching of DNS Queries	2308
SMFAX-IM	Simple Mode of FAX Using Internet Mail	2305
MINFAX-IM	Minimal FAX addr format in Internet Mail	2304
MIN-PSTN	Min. PSTN addr format in Internet Mail	2303
TIFF	Tag Image File Format	2302
FFIF	File Format for Internet Fax	2301
EMF-MDN	Extensible Message Format for MDN	2298
OR-ADD	O/R Address hierarchy in X.500	2294
SUBTABLE	Tables and Subtrees in X.500	2293
--------	Mobile-IPv4 Config Opt for PPP IPCP	2290
SLM-APP	System-Level Managed Objects for Apps	2287
PPP-EAP	PPP Extensible Authentication Protocol	2284
MEXT-BGP4	Multiprotocol Extensions for BGP-4	2283
RPSL	Routing Policy Specification Language	2280
UTF-8	UTF-8 transformation format of ISO 10646	2279
--------	IEEE 802.12 Repeater MIB	2266
AGENTX	Agent Extensibility Protocol	2257
--------	Summary of the X.500(96) with LDAPv3	2256
LDAP-URL	LDAP URL Format	2255
STR-LDAP	String Rep of LDAP Search Filters	2254
LDAP3-UTF8	LDAPv3: UTF-8 String Rep	2253

LDAP3-ATD	LDAP3-: Attribute Syntax Definitions	2252
LDAPV3	Lightweight Directory Access Protocol	2251
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MAIL-MIB	Mail Monitoring MIB	2249
NSM-MIB	Network Services Monitoring MIB	2248
--------	Using Domains LDAP/X.500 Dist. Names	2247
SASL-ANON	Anonymous SASL Mechanism	2245
ACAP	Application Configuration Access	2244
OTP-ER	OTP Extended Responses	2243
NETWAREIP	NetWare/IP Domain Name and Information	2242
DHCP-NDS	DHCP Options for Novell Directory Serv.	2241
MAUS-MIB	IEEE 802.3 Medium Attachment Units MIB	2239
HPR-MIB	Definitions of Managed Objects for HPR	2238
IGMP	Internet Group Management Protocol V2	2236
ABNF	Augmented BNF for Syntax Specifications	2234
INTERGRMIB	Interfaces Group MIB	2233
DLUR-MIB	Definitions of Managed Objects for DLUR	2232
MIME-EXT	MIME Parameter Value & Encoded Word Ext	2231
FTPSECEXT	FTP Security Extensions	2228
---------	Simple Hit-Metering, Usage-Limiting HTTP	2227
---------	IP Broadcast over ATM Networks	2226
SASL	Simple Authentication and Security Layer	2222
IMAP4LOGIN	IMAP4 Login Referrals	2221
---------	Schema for Internet White Pages Service	2218
---------	Characterization Parameters for ISNE	2215
---------	Integrated Services MIB Guar Serv Ext	2214
---------	Integrated Services MIB using SMIv2	2213
GQOS	Spec. of Guaranteed Quality of Service	2212
---------	Spec. of Controlled-Load Net Ele Serv	2211
RSVP-IS	Use of RSVP with IETF Integrated Serv	2210
RSVP-MPR	RSVP Messaging Processing Rules	2209
RSVP-IPSEC	RSVP Extensions for IPSEC Data Flows	2207
RSVP-MIB	RSVP Management Information Base	2206
RSVP	Resource ReSerVation Protocol V1	2205
RPCSEC-GSS	RPCSEC_GSS Protocol Specification	2203
RTP-RAD	RTP Payload for Redundant Audio Data	2198
IMAPPOPAU	IMAP/POP AUTHorize Extension	2195
IMAP4MAIL	IMAP4 Mailbox Referrals	2193
IMAP-URL	IMAP URL Scheme	2192
---------	RTP Payload Format for H.263 Video ST	2190
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DNS-CLAR	Clarifications to the DNS Specification	2181
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SLP	Service Location Protocol	2165
---------	X.500/LDAP Directory/MIXER Address Map.	2164
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---------	Mapping between X.400 and RFC-822/MIME	2157
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URN-SYNTAX	URN Syntax	2141
RADIUS	Remote Authentication Dial In Service	2138
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DNS-UPDATE	Dynamic Updates in the DNS	2136
DC-MIB	Dial Control MIB using SMIv2	2128
ISDN-MIB	ISDN MIB using SMIv2	2127
ITOT	ISO Transport Service on top of TCP	2126
BAP-BACP	PPP-BAP, PPP-BACP	2125
VEMMI-URL	VEMMI URL Specification	2122
ROUT-ALERT	IP Router Alert Option	2113
MHTML	MIME E-mail Encapsulation	2110
HTTP-STATE	HTTP State Management Mechanism	2109
802.3-MIB	802.3 Repeater MIB using SMIv2	2108
PPP-NBFCP	PPP NetBIOS Frames Control Protocol	2097
TABLE-MIB	IP Forwarding Table MIB	2096
RIP-TRIG	Trigger RIP	2091
IMAP4-LIT	IMAP4 non-synchronizing literals	2088
IMAP4-QUO	IMAP4 QUOTA extension	2087
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HMAC-MD5	HMAC-MD5 IP Auth. with Replay Prevention	2085
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DAA	Digest Access Authentication	2069
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SNANAU-APP	SNANAU APPC MIB using SMIv2	2051
PPP-SNACP	PPP SNA Control Protocol	2043
ENTITY-MIB	Entity MIB using SMIv2	2037
RTP-JPEG	RTP Payload Format for JPEG-compressed	2035
SMTP-ENH	SMTP Enhanced Error Codes	2034
RTP-H.261	RTP Payload Format for H.261	2032
RTP-CELLB	RTP Payload Format of Sun’s CellB	2029
SPKM	Simple Public-Key GSS-API Mechanism	2025
DLSW-MIB	DLSw MIB using SMIv2	2024
IPV6-PPP	IP Version 6 over PPP	2023

MULTI-UNI	Multicast over UNI 3.0/3.1 based ATM	2022
RMON-MIB	RMON MIB using SMIv2	2021
802.12-MIB	IEEE 802.12 Interface MIB	2020
IPV6-FDDI	Transmission of IPv6 Packets Over FDDI	2019
TCP-ACK	TCP Selective Acknowledgement Options	2018
URL-ACC	URL Access-Type	2017
MIME-PGP	MIME Security with PGP	2015
MIB-UDP	SNMPv2 MIB for UDP	2013
MIB-TCP	SNMPv2 MIB for TCP	2012
MIB-IP	SNMPv2 MIB for IP	2011
MOBILEIPMIB	Mobile IP MIB Definition using SMIv2	2006
MINI-IP	Minimal Encapsulation within IP	2004
IPENCAPIP	IP Encapsulation within IP	2003
MOBILEIPSUP	IP Mobility Support	2002
TCPSLOWSRT	TCP Slow Start, Congestion Avoidance...	2001
BGP-COMM	BGP Communities Attribute	1997
DNS-NOTIFY	Mech. for Notification of Zone Changes	1996
DNS-IZT	Incremental Zone Transfer in DNS	1995
SMTP-ETRN	SMTP Service Extension ETRN	1985
SNA	Serial Number Arithmetic	1982
MTU-IPV6	Path MTU Discovery for IP version 6	1981
PPP-FRAME	PPP in Frame Relay	1973
IPV6-ETHER	Transmission IPv6 Packets Over Ethernet	1972
PPP-ECP	PPP Encryption Control Protocol	1968
GSSAPI-KER	Kerberos Version 5 GSS-API Mechanism	1964
PPP-CCP	PPP Compression Control Protocol	1962
GSSAPI-SOC	GSS-API Auth for SOCKS Version 5	1961
LDAP-STR	String Rep. of LDAP Search Filters	1960
LDAP-URL	LDAP URL Format	1959
TRANS-IPV6	Transition Mechanisms IPv6 Hosts/Routers	1933
AUTH-SOCKS	Username Authentication for SOCKS V5	1929
SOCKSV5	SOCKS Protocol Version 5	1928
WHOIS++M	How to Interact with a Whois++ Mesh	1914
WHOIS++A	Architecture of Whois++ Index Service	1913
DSN	Delivery Status Notifications	1894
EMS-CODE	Enhanced Mail System Status Codes	1893
MIME-RPT	Multipart/Report	1892
SMTP-DSN	SMTP Delivery Status Notifications	1891
RTP-AV	RTP Audio/Video Profile	1890
RTP	Transport Protocol for Real-Time Apps	1889
DNS-IPV6	DNS Extensions to support IPv6	1886
HTML	Hypertext Markup Language - 2.0	1866
MIME-Sec	MIME Object Security Services	1848
MIME-Encyp	MIME: Signed and Encrypted	1847
WHOIS++	Architecture of the WHOIS++ service	1835
--------	Binding Protocols for ONC RPC Version 2	1833
XDR	External Data Representation Standard	1832
RPC	Remote Procedure Call Protocol V. 2	1831

--------	ESP DES-CBC Transform	1829
--------	IP Authentication using Keyed MD5	1828
ESP	IP Encapsulating Security Payload	1827
IPV6-AH	IP Authentication Header	1826
--------	Security Architecture for IP	1825
R	Requirements for IP Version 4 Routers	1812
URL	Relative Uniform Resource Locators	1808
CLDAP	Connection-less LDAP	1798
OSPF-DC	Ext. OSPF to Support Demand Circuits	1793
OSI-Dir	OSI User Friendly Naming ...	1781
MIME-EDI	MIME Encapsulation of EDI Objects	1767
Lang-Tag	Tags for Identification of Languages	1766
XNSCP	PPP XNS IDP Control Protocol	1764
BVCP	PPP Banyan Vines Control Protocol	1763
Print-MIB	Printer MIB	1759
ATM-SIG	ATM Signaling Support for IP over ATM	1755
IPNG	Recommendation for IP Next Generation	1752
802.5-SSR	802.5 SSR MIB using SMIv2	1749
SDLCSMIv2	SNADLC SDLC MIB using SMIv2	1747
BGP4/IDRP	BGP4/IDRP for IP/OSPF Interaction	1745
AT-MIB	Appletalk MIB	1742
MacMIME	MIME Encapsulation of Macintosh files	1740
URL	Uniform Resource Locators	1738
POP3-AUTH	POP3 AUTHentication command	1734
IMAP4-AUTH	IMAP4 Authentication Mechanisms	1731
RDBMS-MIB	RDMS MIB - using SMIv2	1697
MODEM-MIB	Modem MIB - using SMIv2	1696
ATM-MIB	ATM Management Version 8.0 using SMIv2	1695
TMUX	Transport Multiplexing Protocol	1692
SNANAU-MIB	SNA NAUs MIB using SMIv2	1666
PPP-TRANS	PPP Reliable Transmission	1663
--------	Postmaster Convention X.400 Operations	1648
PPP-BCP	PPP Bridging Control Protocol	1638
UPS-MIB	UPS Management Information Base	1628
PPP-SONET	PPP over SONET/SDH	1619
PPP-ISDN	PPP over ISDN	1618
DNS-R-MIB	DNS Resolver MIB Extensions	1612
DNS-S-MIB	DNS Server MIB Extensions	1611
FR-MIB	Frame Relay Service MIB	1604
PPP-X25	PPP in X.25	1598
OSPF-NSSA	The OSPF NSSA Option	1587
OSPF-Multi	Multicast Extensions to OSPF	1584
SONET-MIB	MIB SONET/SDH Interface Type	1595
RIP-DC	Extensions to RIP to Support Demand Cir.	1582
--------	Evolution of the Interfaces Group of MIB-II Elective	1573
TOPT-ENVIR	Telnet Environment Option	1572
PPP-LCP	PPP LCP Extensions	1570
X500-MIB	X.500 Directory Monitoring MIB	1567

CIPX	Compressing IPX Headers Over WAM Media	1553
IPXCP	PPP Internetworking Packet Exchange Control Elective	1552
SRB-MIB	Source Routing Bridge MIB	1525
CIDR-STRA	CIDR Address Assignment...	1519
CIDR-ARCH	CIDR Architecture...	1518
--------	802.3 MAU MIB	1515
HOST-MIB	Host Resources MIB	1514
--------	Token Ring Extensions to RMON MIB	1513
FDDI-MIB	FDDI Management Information Base	1512
KERBEROS	Kerberos Network Authentication Ser (V5)	1510
GSSAPI	Generic Security Service API: C-bindings	1509
DASS	Distributed Authentication Security...	1507
--------	X.400 Use of Extended Character Sets	1502
HARPOON	Rules for Downgrading Messages...	1496
Equiv	X.400/MIME Body Equivalences	1494
IDPR	Inter-Domain Policy Routing Protocol	1479
IDPR-ARCH	Architecture for IDPR	1478
PPP/Bridge MIB	Bridge PPP MIB	1474
PPP/IP MIB	IP Network Control Protocol of PPP MIB	1473
PPP/SEC MIB	Security Protocols of PPP MIB	1472
PPP/LCP MIB	Link Control Protocol of PPP MIB	1471
X25-MIB	Multiprotocol Interconnect on X.25 MIB	1461
SNMPv2	Introduction to SNMPv2	1441
PEM-KEY	PEM - Key Certification	1424
PEM-ALG	PEM - Algorithms, Modes, and Identifiers	1423
PEM-CKM	PEM - Certificate-Based Key Management	1422
PEM-ENC	PEM - Message Encryption and Auth	1421
SNMP-IPX	SNMP over IPX	1420
SNMP-AT	SNMP over AppleTalk	1419
SNMP-OSI	SNMP over OSI	1418
FTP-FTAM	FTP-FTAM Gateway Specification	1415
IDENT-MIB	Identification MIB	1414
IDENT	Identification Protocol	1413
DS3/E3-MIB	DS3/E3 Interface Type	1407
DS1/E1-MIB	DS1/E1 Interface Type	1406
BGP-OSPF	BGP OSPF Interaction	1403
--------	Route Advertisement In BGP2 And BGP3	1397
SNMP-X.25	SNMP MIB Extension for X.25 Packet Layer	1382
SNMP-LAPB	SNMP MIB Extension for X.25 LAPB	1381
PPP-ATCP	PPP AppleTalk Control Protocol	1378
PPP-OSINLCP	PPP OSI Network Layer Control Protocol	1377
TOPT-RFC	Remote Flow Control	1372
SNMP-PARTY-MIB	Administration of SNMP	1353
SNMP-SEC	SNMP Security Protocols	1352
SNMP-ADMIN	SNMP Administrative Model	1351
TOS	Type of Service in the Internet	1349
PPP-IPCP	PPP Control Protocol	1332
-------	X.400 1988 to 1984 downgrading	1328

TCP-EXT	TCP Extensions for High Performance	1323
NETFAX	File Format for the Exchange of Images	1314
FDDI-MIB	FDDI-MIB	1285
-------	Encoding Network Addresses	1277
-------	Replication and Distributed Operations	1276
-------	COSINE and Internet X.500 Schema	1274
BGP-MIB	Border Gateway Protocol MIB (Version 3)	1269
ICMP-ROUT	ICMP Router Discovery Messages	1256
OSI-UDP	OSI TS on UDP	1240
STD-MIBs	Reassignment of Exp MIBs to Std MIBs	1239
IPX-IP	Tunneling IPX Traffic through IP Nets	1234
IS-IS	OSI IS-IS for TCP/IP Dual Environments	1195
IP-CMPRS	Compressing TCP/IP Headers	1144
TOPT-XDL	X Display Location	1096
TOPT-TERM	Terminal Type	1091
TOPT-TS	Terminal Speed	1079
TOPT-NAWS	Negotiate About Window Size	1073
TOPT-X.3	X.3 PAD	1053
TOPT-DATA	Data Entry Terminal	1043
TOPT-3270	Telnet 3270 Regime	1041
NNTP	Network News Transfer Protocol	977
TOPT-TLN	Terminal Location Number	946
TOPT-OM	Output Marking	933
TOPT-TACACS	TACACS User Identification	927
TOPT-EOR	End of Record	885
TOPT-SNDL	Send Location	779
TOPT-SUPO	SUPDUP Output	749
TOPT-SUP	SUPDUP	736
TOPT-BYTE	Byte Macro	735
TOPT-REM	Remote Controlled Trans and Echo	726
TOPT-LOGO	Logout	727
TOPT-EXT	Extended ASCII	698

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2.5. Experimental Protocols

Protocol	Name	RFC
-------	NewReno Modification to TCP's Fast Recovery Algorithm	2582*
-------	Mapping between LPD and IPP Protocols	2569*
IPP-RAT	Rationale for the Structure of IPP	2568*
IPP-DG	Design Goals for an Internet Printing Protocol	2567*
IPP-M-S	Internet Printing Protocol/1.0: Model and Semantics	2566*
IPP-E-T	Internet Printing Protocol/1.0: Encoding and Transport	2565*
DNS-INFO	Detached Domain Name System (DNS) Information	2540*
PHOTURIS-E	Photuris: Extended Schemes and Attributes	2523*
PHOTURIS-S	Photuris: Session-Key Management Protocol	2522*
ICMP-SEC	ICMP Security Failures Messages	2521*
NHRP-MNHCS	NHRP with Mobile NHCs	2520*
IPPM-MET	IPPM Metrics for Measuring Connectivity	2498*
-------	URI Resolution Services	2483*
ECN-IP	Explicit Congestion Notification (ECN) to IP	2481*
-------	IPv6 Testing Address Allocation	2471*
TCP-WIN	Increasing TCP's Initial Window	2414
PIM-SM	Protocol Independent Multicast-Sparse Mode	2362
-------	Domain Names and Company Name Retrieva	2345
RTP-MPEG	RTP Payload Format for Bundled MPEG	2343
-------	Intra-LIS IP Multicast/Routers over ATM using PIM	2337
-------	Safe Response Header Field	2310
LDAP-NIS	Approach Using LDAP as a Network Information Service	2307
HTTP-RVSA	HTTP Remote Variant Selection Algorithm	2296
TCN-HTTP	Transparent Content Negotiation in HTTP	2295
TOPT-COMPORT	Telnet Com Port Control	2217
-------	Core Based Trees (CBT) Multicast Routing Architecture	2201
-------	Core Based Trees (CBT version 2) Multicast Routing	2189
-------	Trivial Convention using HTTP in URN Resolution	2169
-------	Resolution of URIs using DNS	2168
MAP-MAIL	X.400 Mapping and Mail-11	2162
MIME-ODA	A MIME Body Part for ODA	2161
OSPF-DIG	OSPF with Digital Signature	2154
GKMP-ARCH	Group Key Management Protocol (GKMP) Architecture	2094
GKMP-SPEC	Group Key Management Protocol (GKMP) Specification	2093
TOPT-CHARSET	Telnet CHARSET	2066
IP-SCSI	Encapsulating IP with the SCSI	2143
X.500-NAME	Managing the X.500 Root Naming Context	2120
TFTP-MULTI	TFTP Multicast Option	2090
IP-Echo	IP Echo Host Service	2075
METER-MIB	Traffic Flow Measurement Meter MIB	2064
TFM-ARCH	Traffic Flow Measurement Architecture	2063
DNS-SRV	Location of Services in the DNS	2052
URAS	Uniform Resource Agents	2016
GPS-AR	GPS-Based Addressing and Routing	2009

ETFTP	Enhanced Trivial File Transfer Protocol	1986
BGP-RR	BGP Route Reflection	1966
BGP-ASC	Autonomous System Confederations for BGP	1965
SMKD	Scalable Multicast Key Distribution	1949
HTML-TBL	HTML Tables	1942
SNMPV2SM	User-based Security Model for SNMPv2	1910
SNMPV2AI	SNMPv2 Administrative Infrastructure	1909
SNMPV2CB	Introduction to Community-based SNMPv2	1901
-------	IPv6 Testing Address Allocation	1897
DNS-LOC	Location Information in the DNS	1876
SGML-MT	SGML Media Types	1874
CONT-MT	Access Type Content-ID	1873
UNARP	ARP Extension - UNARP	1868
-------	Form-based File Upload in HTML	1867
-------	BGP/IDRP Route Server Alternative	1863
-------	IP Authentication using Keyed SHA	1852
ESP3DES	ESP Triple DES Transform	1851
-------	SMTP 521 Reply Code	1846
-------	SMTP Serv. Ext. for Checkpoint/Restart	1845
-------	SMTP Serv. Ext. Large and Binary MIME Msgs.	1830
ST2	Stream Protocol Version 2	1819
-------	Content-Disposition Header	1806
-------	Schema Publishing in X.500 Directory	1804
-------	X.400-MHS use X.500 to support X.400-MHS Routing	1801
-------	Class A Subnet Experiment	1797
TCP/IPXMIB	TCP/IPX Connection Mib Specification	1792
-------	TCP And UDP Over IPX Networks With Fixed Path MTU	1791
ICMP-DM	ICMP Domain Name Messages	1788
CLNP-MULT	Host Group Extensions for CLNP Multicasting	1768
OSPF-OVFL	OSPF Database Overflow	1765
RWP	Remote Write ProtocolL - Version 1.0	1756
NARP	NBMA Address Resolution Protocol	1735
DNS-ENCODE	DNS Encoding of Geographical Location	1712
TCP-POS	An Extension to TCP: Partial Order Service	1693
T/TCP	TCP Extensions for Transactions	1644
MIME-UNI	Using Unicode with MIME	1641
FOOBAR	FTP Operation Over Big Address Records	1639
X500-CHART	Charting Networks in the X.500 Directory	1609
X500-DIR	Representing IP Information in the X.500 Directory	1608
SNMP-DPI	SNMP Distributed Protocol Interface	1592
CLNP-TUBA	Use of ISO CLNP in TUBA Environments	1561
REM-PRINT	TPC.INT Subdomain Remote Printing - Technical	1528
EHF-MAIL	Encoding Header Field for Internet Messages	1505
RAP	Internet Route Access Protocol	1476
TP/IX	TP/IX: The Next Internet	1475
X400	Routing Coordination for X.400 Services	1465
DNS	Storing Arbitrary Attributes in DNS	1464
IRCP	Internet Relay Chat Protocol	1459

TOS-LS	Link Security TOS	1455
SIFT/UFT	Sender-Initiated/Unsolicited File Transfer	1440
DIR-ARP	Directed ARP	1433
TOPT-AUTH	Telnet Authentication Option	1416
TEL-SPX	Telnet Authentication: SPX	1412
TEL-KER	Telnet Authentication: Kerberos V4	1411
TRACE-IP	Traceroute Using an IP Option	1393
DNS-IP	Experiment in DNS Based IP Routing	1383
RMCP	Remote Mail Checking Protocol	1339
TCP-HIPER	TCP Extensions for High Performance	1323
MSP2	Message Send Protocol 2	1312
DSLCP	Dynamically Switched Link Control	1307
--------	X.500 and Domains	1279
IN-ENCAP	Internet Encapsulation Protocol	1241
CLNS-MIB	CLNS-MIB	1238
CFDP	Coherent File Distribution Protocol	1235
IP-AX.25	IP Encapsulation of AX.25 Frames	1226
ALERTS	Managing Asynchronously Generated Alerts	1224
MPP	Message Posting Protocol	1204
SNMP-BULK	Bulk Table Retrieval with the SNMP	1187
DNS-RR	New DNS RR Definitions	1183
IMAP2	Interactive Mail Access Protocol	1176
NTP-OSI	NTP over OSI Remote Operations	1165
DMF-MAIL	Digest Message Format for Mail	1153
RDP	Reliable Data Protocol	908,1151
TCP-ACO	TCP Alternate Checksum Option	1146
IP-DVMRP	IP Distance Vector Multicast Routing	1075
VMTP	Versatile Message Transaction Protocol	1045
COOKIE-JAR	Authentication Scheme	1004
NETBLT	Bulk Data Transfer Protocol	998
IRTP	Internet Reliable Transaction Protocol	938
LDP	Loader Debugger Protocol	909
RLP	Resource Location Protocol	887
NVP-II	Network Voice Protocol	ISI-memo
PVP	Packet Video Protocol	ISI-memo

[Note: an asterisk at the end of a line indicates a change from the previous edition of this document.]

3. Current Applicability Statements

RFC1122 - Requirements for Internet hosts - communication layers (STD 3)
RFC1123 - Requirements for Internet hosts - application and support (STD 3)
RFC1370 - Applicability Statement for OSPF
RFC1517 - Applicability Statement for the Implementation of Classless Inter-Domain Routing (CIDR)
RFC1722 - RIP Version 2 Protocol Applicability Statement
RFC1923 - RIPv1 Applicability Statement for Historic Status
RFC2005 - Applicability Statement for IP Mobility Support
RFC2039 - Applicability of Standards Track MIBs to Management of World Wide Web Servers
RFC2081 - RIPng Protocol Applicability Statement
RFC2208 - Resource ReSerVation Protocol (RSVP) -- Version 1 Applicability Statement - Some Guidelines on Deployment
RFC2333 - NHRP Protocol Applicability Statement
RFC2556 - OSI connectionless transport services on top of UDP Applicability Statement for Historic Status

4. Non-Standard Protocols

4.1. Informational Protocols

Please note that there are informational RFCs that do not specify protocols and are not listed here.

Protocol	Name	RFC
AUDIO/L16	Audio/L16 MIME content type	2586*
FTP-SEC	FTP Security Considerations	2577*
--------	6Bone Routing Practice	2546*
DNS-SOC	DNS Security Operational Considerations	2541*
--------	Internet X.509 Public Key Infrastructure KEA	2528*
--------	Internet X.509 Public Key Infrastructure CP & CPF	2527*
--------	Known TCP Implementation Problems	2525*
EMSD	Neda's Efficient Mail Submission and Delivery Protocol	2524*
IDRA	Framework for Inter-Domain Route Aggregation	2519*
PPPOE	Method for Transmitting PPP Over Ethernet	2516*
--------	MIME Types for Use with the ISO ILL Protocol	2503*
MANET	Mobile Ad hoc Networking Performance Issues	2501*
--------	ST2+ over ATM Protocol Spec - UNI 3.1 Version	2383
--------	Mapping Airline Reservation, Ticketing, Messaging	2351
KOI8-U	Ukrainian Character Set KOI8-U	2319
TEXT-CSS	The text/css Media Type	2318
PKCS-7	PKCS #7: Cryptographic Message Syntax Version 1.5	2315
PKCS-10	PKCS #10: Certification Request Syntax Version 1.5	2314
PKCS-1	PKCS #1: RSA Encryption Version 1.5	2313
SMIME-CERT	S/MIME Version 2 Certificate Handling	2312
SMIME-MSG	S/MIME Version 2 Message Specification	2311
TIFF	Tag Image File Format F Profile for Facsimile	2302
GSMP	Ipsilon's General Switch Management Protocol	2297
HSRP	Cisco Hot Standby Router Protocol (HSRP)	2281
RC2-ENCRP	A Description of the RC2(r) Encryption Algorithm	2268
SNQP	Simple Nomenclator Query Protocol	2259
--------	Japanese Character Encoding for Internet Messages	2237
KEYX-DNS	Key Exchange Delegation Record for the DNS	2230
DSP	A Dictionary Server Protocol	2229
NFS-URL	NFS URL Scheme	2224
APP-MARC	The Application/MARC Content-type	2220
ODETTE-FTP	ODETTE File Transfer Protocol	2204
ESRO	AT&T/Neda's Efficient Short Remote Operations Protocol	2188
ICP	Internet Cache Protocol Version 2	2186
IPV4-MAPOS	IPv4 over MAPOS Version 1	2176
MAPOS-SONET	Multiple Access Protocol over SONET/SDH Version 1	2171
RWHOIS	Referral Whois Protocol	2167
PPP-EXT	PPP Vendor Extensions	2153
UTF-7	UTF-7	2152

CAST-128	CAST-128 Encryption Algorithm	2144
RADIUS-ACC	RADIUS Accounting	2139
DLSCAP	Data Link Switching Client Access Protocol	2114
PNG	Portable Network Graphics Version 1.0	2083
RC5	RC5, RC5-CBC, RC5-CBC-Pad, and RC5-CTS Algorithms	2040
SNTP	Simple Network Time Protocol v4 for IPv4, IPv6 and OSI	2030
PGP-MEF	PGP Message Exchange Formats	1991
PPP-DEFL	PPP Deflate Protocol	1979
PPP-PRED	PPP Predictor Compression Protocol	1978
PPP-BSD	PPP BSD Compression Protocol	1977
PPP-DCE	PPP for Data Compression in DCE	1976
PPP-MAG	PPP Magnalink Variable Resource Compression	1975
PPP-STAC	PPP Stac LZS Compression Protocol	1974
GZIP	GZIP File Format Specification Version 4.3	1952
DEFLATE	DEFLATE Compressed Data Format Specification V. 1.3	1951
ZLIB	ZLIB Compressed Data Format Specification V. 3.3	1950
HTTP-1.0	Hypertext Transfer Protocol -- HTTP/1.0	1945
--------	text/enriched MIME Content-type	1896
--------	Application/CALS-1840 Content-type	1895
--------	PPP IPCP Extensions for Name Server Addresses	1877
SNPP	Simple Network Paging Protocol - Version 2	1861
--------	ISO Transport Class 2 Non-use Explicit Flow Control over TCP RFC1006 extension	1859
--------	IP in IP Tunneling	1853
--------	PPP Network Control Protocol for LAN Extension	1841
TESS	The Exponential Security System	1824
NFSV3	NFS Version 3 Protocol Specification	1813
--------	A Format for Bibliographic Records	1807
-------	Data Link Switching: Switch-to-Switch Protocol	1795
BGP-4	Experience with the BGP-4 Protocol	1773
SDMD	IPv4 Option for Sender Directed MD Delivery	1770
SNOOP	Snoop Version 2 Packet Capture File Format	1761
BINHEX	MIME Content Type for BinHex Encoded Files	1741
DNS-NSAP	DNS NSAP Resource Records	1706
RADIO-PAGE	TPC.INT Subdomain: Radio Paging -- Technical Procedures	1703
GRE-IPv4	Generic Routing Encapsulation over IPv4	1702
GRE	Generic Routing Encapsulatio	1701
ADSNA-IP	Advanced SNA/IP: A Simple SNA Transport Protocol	1538
TACACS	Terminal Access Control Protocol	1492
MD4	MD4 Message Digest Algorithm	1320
SUN-NFS	Network File System Protocol	1094
SUN-RPC	Remote Procedure Call Protocol Version 2	1057
GOPHER	The Internet Gopher Protocol	1436
LISTSERV	Listserv Distribute Protocol	1429
-------	Replication Requirements	1275
PCMAIL	Pcmail Transport Protocol	1056
MTP	Multicast Transport Protocol	1301
BSD Login	BSD Login	1282

DIXIE	DIXIE Protocol Specification	1249
IP-X.121	IP to X.121 Address Mapping for DDN	1236
OSI-HYPER	OSI and LLC1 on HYPERchannel	1223
HAP2	Host Access Protocol	1221
SUBNETASGN	On the Assignment of Subnet Numbers	1219
SNMP-TRAPS	Defining Traps for use with SNMP	1215
DAS	Directory Assistance Service	1202
LPDP	Line Printer Daemon Protocol	1179

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4.2. Historic Protocols

Protocol	Name	RFC	STD
CONTENT	Content Type Header Field	1049	11 *
IPV6-UNI	IPv6 Provider-Based Unicast Address	2073	
IPV6-Addr	IPv6 Addressing Architecture	1884	
L2F	Cisco Layer Two Forwarding Protocol	2341	
IPSO	DoD Security Options for IP	1108	
SNMPv2	Manager-to-Manager MIB	1451	
SNMPv2	Party MIB for SNMPv2	1447	
SNMPv2	Security Protocols for SNMPv2	1446	
SNMPv2	Administrative Model for SNMPv2	1445	
RIP	Routing Information Protocol	1058	34
--------	Mapping full 822 to Restricted 822	1137	
BGP3	Border Gateway Protocol 3 (BGP-3)	1267,1268	
--------	Gateway Requirements	1009	4
EGP	Exterior Gateway Protocol	904	18
SNMP-MUX	SNMP MUX Protocol and MIB	1227	
OIM-MIB-II	OSI Internet Management: MIB-II	1214	
IMAP3	Interactive Mail Access Protocol Version 3	1203	
SUN-RPC	Remote Procedure Call Protocol Version 1	1050	
802.4-MIP	IEEE 802.4 Token Bus MIB	1230	
CMOT	Common Management Information Services	1189	
--------	Mail Privacy: Procedures	1113	
--------	Mail Privacy: Key Management	1114	
--------	Mail Privacy: Algorithms	1115	
NFILE	A File Access Protocol	1037	
HOSTNAME	HOSTNAME Protocol	953	
SFTP	Simple File Transfer Protocol	913	
SUPDUP	SUPDUP Protocol	734	
BGP	Border Gateway Protocol	1163,1164	
MIB-I	MIB-I	1156	
TOPT-ENVIR	Telnet Environment Option	1408	
SGMP	Simple Gateway Monitoring Protocol	1028	
HEMS	High Level Entity Management Protocol	1021	

STATSRV	Statistics Server	996
POP2	Post Office Protocol, Version 2	937
RATP	Reliable Asynchronous Transfer Protocol	916
HFEP	Host - Front End Protocol	929
THINWIRE	Thinwire Protocol	914
HMP	Host Monitoring Protocol	869
GGP	Gateway Gateway Protocol	823
RTELNET	Remote Telnet Service	818
CLOCK	DCNET Time Server Protocol	778
MPM	Internet Message Protocol	759
NETRJS	Remote Job Service	740
TOPT-OLD	Output Linefeed Disposition	658
TOPT-OVTD	Output Vertical Tab Disposition	657
TOPT-OVT	Output Vertical Tabstops	656
TOPT-OFD	Output Formfeed Disposition	655
TOPT-OHTD	Output Horizontal Tab Disposition	654
TOPT-OHT	Output Horizontal Tabstops	653
TOPT-OCRD	Output Carriage-Return Disposition	652
NETED	Network Standard Text Editor	569
RJE	Remote Job Entry	407
XNET	Cross Net Debugger	IEN-158
NAMESERVER	Host Name Server Protocol	IEN-116
MUX	Multiplexing Protocol	IEN-90
GRAPHICS	Graphics Protocol	NIC-24308

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5. Contacts

5.1. IAB, IETF, and IRTF Contacts

Internet Architecture Board (IAB) Contact: www.iab.org

Internet Engineering Task Force (IETF) Contact: www.ietf.org

Internet Research Task Force (IRTF) Contact: www.irtf.org

5.2. Internet Assigned Numbers Authority Contact

See: www.iana.org

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See: www.rfc-editor.org

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   Doc-ID: RFCnnnn
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(Where "nnnn" refers to the number of the RFC (always use 4 digits - the DOC-ID of RFC 822 is "RFC0822")). The RFC-INFO@ISI.EDU server provides other ways of selecting RFCs based on keywords and such; for more information send a message to "rfc-info@isi.edu" with the message body "help: help".

contact: RFC-Manager@ISI.EDU

5.5. Sources for Requests for Comments

Details on many sources of RFCs via FTP or EMAIL may be obtained by sending an EMAIL message to "rfc-info@ISI.EDU" with the message body "help: ways_to_get_rfcs". For example:

```
To: rfc-info@ISI.EDU
Subject: getting rfcs

help: ways_to_get_rfcs
```

6. Security Considerations

This memo does not affect the technical security of the Internet, but it does cite a number of important security specifications.

7. Editors' Addresses

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