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# Network Protocols

v000.1

Our company provides following kinds of services related to network protocols:

- implementation of the protocol or network stack from scratch for any UNIX-like, real time or embedded operating system;
- implementation of the new protocol(s) inside existing protocol stack;
- implementation of the new feature/option for the existing protocol implementation;
- porting of existing solution to your OS and/or product;
- fixing of bugs in existing implementations;
- optimisation of existing implementation;
- investigation of existing solutions.

Our engineers are able to:

- perform lookup of existing standards, practices, solutions, etc. in the Internet;
- recommend the scope of functionality to be implemented for your case;
- recommend/design application programming and management interfaces (SNMP, TR069, CLI, etc.) for the stack/protocol;
- work with existing source code of different quality;
- implement required functionality (including API and management interface) with required quality level;
- provide testing with required test coverage;
- provide support and customer service.

We are most experienced in the following areas:

- Ethernet, VLAN, bridging and switching;
- IEEE 802.11 (known as WiFi/WLAN);
- ATM and everything over ATM;
- IPv4 and IPv6; firewalls; NAT; STUN;
- IPSec;
- TCP and UDP; Berkeley sockets and Winsock2;

- FTP;
- DHCP, BOOTP;
- DNS;
- SSH, SSL
- routing protocols;
- QoS; MPLS; RSVP;
- iSCSI;
- VoIP: SIP;
- UPnP;
- IGMP;
- network management protocols (SNMP v1/2/3, TR069).

We prefer to use C for protocol implementation, but can provide C++ implementations as well.