

## Consider the SNMP-Listing No. 3/1 and 3/2.

The host "Labserver" from the Laboratory was queried by using a SNMP-browser

- 1 Identify what kind of Interfaces are connected to the Labserver .  
Explain your answer
- 2 Identify what kind of IP-Addresses are assigned to these interfaces?  
Explain your answer

### Listing 3/1

#### C:\>snmputil walk labserver public 1.3.6.1.2.1.4.20.1.2

Variable = ip.ipAddrTable.ipAddrEntry.ipAdEntIfIndex.127.0.0.1

Value = INTEGER - 1

Variable = ip.ipAddrTable.ipAddrEntry.ipAdEntIfIndex.192.168.0.140

Value = INTEGER - 16777219

Variable = ip.ipAddrTable.ipAddrEntry.ipAdEntIfIndex.192.168.10.140

Value = INTEGER - 16777219

Variable = ip.ipAddrTable.ipAddrEntry.ipAdEntIfIndex.192.168.20.140

Value = INTEGER - 16777219

Variable = ip.ipAddrTable.ipAddrEntry.ipAdEntIfIndex.192.168.30.140

Value = INTEGER - 16777219

Variable = ip.ipAddrTable.ipAddrEntry.ipAdEntIfIndex.194.95.109.66

Value = INTEGER - 16777220

Variable = ip.ipAddrTable.ipAddrEntry.ipAdEntIfIndex.194.95.109.82

Value = INTEGER - 16777220

Variable = ip.ipAddrTable.ipAddrEntry.ipAdEntIfIndex.194.95.109.140

Value = INTEGER - 16777221

End of MIB subtree.

#### C:\>snmputil walk labserver public 1.3.6.1.2.1.2.2.1.2

Variable = interfaces.ifTable.ifEntry.ifDescr.1

Value = OCTET STRING - MS TCP Loopback interface<0x0>

Variable = interfaces.ifTable.ifEntry.ifDescr.16777219

Value = OCTET STRING - Intel(R) PRO/100+ Server Adapter (PILA8470B)<0x0>

Variable = interfaces.ifTable.ifEntry.ifDescr.16777220

Value = OCTET STRING - Intel(R) PRO/100+ Server Adapter (PILA8470B)<0x0>

Variable = interfaces.ifTable.ifEntry.ifDescr.16777221  
Value = OCTET STRING - Intel(R) PRO/100 Network Connection<0x0>

End of MIB subtree.

## **Listing 3/2**

### **C:\>snmputil walk labserver public 1.3.6.1.2.1.2.2.1.3**

Variable = interfaces.ifTable.ifEntry.ifType.1  
Value = INTEGER - 24

Variable = interfaces.ifTable.ifEntry.ifType.16777219  
Value = INTEGER - 6

Variable = interfaces.ifTable.ifEntry.ifType.16777220  
Value = INTEGER - 6

Variable = interfaces.ifTable.ifEntry.ifType.16777221  
Value = INTEGER - 6

End of MIB subtree.

### **C:\>snmputil walk labserver public 1.3.6.1.2.1.2.2.1.5**

Variable = interfaces.ifTable.ifEntry.ifSpeed.1  
Value = Gauge - 10000000

Variable = interfaces.ifTable.ifEntry.ifSpeed.16777219  
Value = Gauge - 100000000

Variable = interfaces.ifTable.ifEntry.ifSpeed.16777220  
Value = Gauge - 10000000

Variable = interfaces.ifTable.ifEntry.ifSpeed.16777221  
Value = Gauge - 100000000

End of MIB subtree.

## SOLUTION

1. Labserver has 3 Ethernet and 1 Loopback interface with following properties:

OID	1.3.6.1.2.1.2.2.1.3.x	1.3.6.1.2.1.2.2.1.5.x	1.3.6.1.2.1.2.2.1.2.x
ifINDEX	ifTYPE	ifSPEED	ifDESCRIPTION
1	SW-Loopback (24)	10Mbit/s	MS TCP Loopback
16777219	Ethernet (6)	100Mbit/s	Intel(R) PRO/100+
16777220	Ethernet (6)	10Mbit/s	Intel(R) PRO/100+
16777221	Ethernet (6)	100Mbit/s	Intel(R) PRO/100

2. IP Addresses are assigned to interfaces as follows:

OID	1.3.6.1.4.20.1.2.x
ifINDEX	IP Address
1	127.0.0.1
16777219	192.168.0.140, 192.168.10.140, 192.168.20.140, 192.168.30.140
16777220	194.95.109.66, 194.95.109.82
16777221	194.95.109.140