

How to create dynamic link aggregation port with SNMP command on DGS-3450 v2.62B28 or later

1. Create static link aggregation port, whose member ports are port 1-2, master port is port 1.

```
$snmpset -c private -v 2c 192.168.1.24
1.3.6.1.4.1.171.11.70.3.2.9.3.1.3.1 i 1
1.3.6.1.4.1.171.11.70.3.2.9.3.1.4.1 x c00000000000000000
1.3.6.1.4.1.171.11.70.3.2.9.3.1.6.1 i 3
1.3.6.1.4.1.171.11.70.3.2.9.3.1.7.1 i 4
```

2. Active the above link aggregation setting.

```
$ snmpset -c private -v 2c 192.168.1.24
1.3.6.1.4.1.171.11.70.3.2.9.3.1.7.1 i 1
```

3. Set lacp mode of port 1, 2 to active.

```
$snmpset -c private -v 2c 192.168.1.24
1.3.6.1.4.1.171.11.70.3.2.9.5.1.2.1 i 1
1.3.6.1.4.1.171.11.70.3.2.9.5.1.2.2 i 1
```

4. Set link aggregation algorithm to ip\_source\_dest.

```
$snmpset -c private -v 2c 192.168.1.24 1.3.6.1.4.1.171.11.70.3.2.9.4.0
i 7
```

Please refer the following the description for each OID's meaning

### OID for link aggregation

The screenshot shows a tree view of SNMP OIDs on the left and a detailed description of the selected OID on the right.

<b>Object name</b>	swL2TrunkCtrlTable
<b>Object ID</b>	1.3.6.1.4.1.171.11.70.3.2.9.3
<b>Module</b>	DGS3450-L2MGMT-MIB
<b>Base syntax</b>	Sequence of swL2TrunkCtrlEntry
<b>Access</b>	Not_Accessible
<b>Status</b>	Current
<b>Sequence</b>	1:swL2TrunkIndex - Integer 2:swL2TrunkName - Octet String 3:swL2TrunkMasterPort - Integer 4:swL2TrunkMember - Octet String 5:swL2TrunkFloodingPort - Integer 6:swL2TrunkType - Integer 7:swL2TrunkState - Integer 8:swL2TrunkActivePorts - Octet String
<b>Parent node</b>	swL2TrunkMgmt
<b>First child</b>	swL2TrunkCtrlEntry
<b>Description</b>	This table specifies which ports group a set of ports (up to 8) into a single logical link.

	<b>Object name</b> swL2TrunkCtrlEntry <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Sequence <b>Access</b> Not_Accessible <b>Status</b> Current <b>Index</b> 1.swL2TrunkIndex  <b>Parent node</b> swL2TrunkCtrlTable <b>First child</b> swL2TrunkIndex <b>Description</b> A list of information specifies which ports group a set of ports(up to 8) into a single logical link.

	<b>Object name</b> swL2TrunkIndex <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1.1 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Integer <b>Composed syntax</b> INTEGER <b>Access</b> Read-Only <b>Status</b> Current <b>Value list</b> 1 : 0..65535  <b>Parent node</b> swL2TrunkCtrlEntry <b>First child</b> None <b>Description</b> The index of logical port trunk. The trunk group number depend on the existence of unit and module.

	<b>Object name</b> swL2TrunkName <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1.2 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Octet String <b>Composed syntax</b> DisplayString <b>Access</b> Read-Create <b>Status</b> Current <b>Value list</b> 1 : 0..12  <b>Parent node</b> swL2TrunkCtrlEntry <b>First child</b> None <b>Description</b> The name of logical port trunk.

	<b>Object name</b> swL2TrunkMasterPort <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1.3 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Integer <b>Composed syntax</b> INTEGER <b>Access</b> Read-Create <b>Status</b> Current <b>Value list</b> 1 : 1..65535  <b>Parent node</b> swL2TrunkCtrlEntry <b>First child</b> None <b>Description</b> The object indicates the master port number of the port trunk entry. When using Port Trunk, you can not configure the other ports of the group except the master port. Their configuration must be same as the master port (e.g. speed, duplex, enabled/disabled, flow control, and so on).

	<b>Object name</b> swL2TrunkMember <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1.4 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Octet String <b>Composed syntax</b> PortList <b>Access</b> Read-Create <b>Status</b> Current <b>Value list</b> 1 : 0..127  <b>Parent node</b> swL2TrunkCtrlEntry <b>First child</b> None <b>Description</b> Indicate how many number of ports is included in this Trunk. The trunk port number depend on the existence of module. The maximum number of ports is 8 for one trunks.

	<b>Object name</b> swL2TrunkFloodingPort <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1.5 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Integer <b>Composed syntax</b> INTEGER <b>Access</b> Read-Only <b>Status</b> Current <b>Value list</b> 1 : 1..65535  <b>Parent node</b> swL2TrunkCtrlEntry <b>First child</b> None <b>Description</b> The object indicates the flooding port number of the port trunk entry. The first port of the trunk is implicitly configured to be the flooding port.

	<b>Object name</b> swL2TrunkType <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1.6 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Integer <b>Composed syntax</b> INTEGER <b>Access</b> Read-Create <b>Status</b> Current <b>Value list</b> 1 : other(1) 2 : static(2) 3 : lacp(3)
<b>Parent node</b> swL2TrunkCtrlEntry <b>First child</b> None <b>Description</b> This object indicated that type of the trunk group. static : is static trunk group lacp : is LACP trunk group .	

	<b>Object name</b> swL2TrunkState <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1.7 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Integer <b>Composed syntax</b> RowStatus <b>Access</b> Read-Create <b>Status</b> Current <b>Value list</b> 1 : active(1) 2 : notInService(2) 3 : notReady(3) 4 : createAndGo(4) 5 : createAndWait(5) 6 : destroy(6)
<b>Parent node</b> swL2TrunkCtrlEntry <b>First child</b> None <b>Description</b> This object indicates the status of this entry.	

	<b>Object name</b> swL2TrunkActivePorts <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.3.1.8 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Octet String <b>Composed syntax</b> PortList <b>Access</b> Read-Only <b>Status</b> Current <b>Value list</b> 1 : 0..127
<b>Parent node</b> swL2TrunkCtrlEntry <b>First child</b> None <b>Description</b> The object indicates the active ports of the port trunk entry.	

	<b>Object name</b> swL2TrunkLACPPortTable <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.5 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Sequence of swL2TrunkLACPPortEntry <b>Access</b> Not_Accessible <b>Status</b> Current <b>Sequence</b> 1:swL2TrunkLACPPortIndex - Integer 2:swL2TrunkLACPPortState - Integer
<b>Parent node</b> swL2TrunkMgmt <b>First child</b> swL2TrunkLACPPortEntry <b>Description</b> This table specifies which ports group a set of ports(up to 8) into a single logical link.	

	<b>Object name</b> swL2TrunkLACPPortEntry <b>Object ID</b> 1.3.6.1.4.1.171.11.70.3.2.9.5.1 <b>Module</b> DGS3450-L2MGMT-MIB
	<b>Base syntax</b> Sequence <b>Access</b> Not_Accessible <b>Status</b> Current <b>Index</b> 1.swL2TrunkLACPPortIndex
<b>Parent node</b> swL2TrunkLACPPortTable <b>First child</b> swL2TrunkLACPPortIndex <b>Description</b> A list of information specifies which ports group a set of ports(up to 8) into a single logical link.	

<ul style="list-style-type: none"> <li>swL2TrunkIndex</li> <li>swL2TrunkName</li> <li>swL2TrunkMasterPort</li> <li>swL2TrunkMember</li> <li>swL2TrunkFloodingPort</li> <li>swL2TrunkType</li> <li>swL2TrunkState</li> <li>swL2TrunkActivePorts</li> <li>swL2TrunkAlgorithm</li> <li>swL2TrunkLACPPortTable</li> <li>swL2TrunkLACPPortEntry</li> <li><b>swL2TrunkLACPPortIndex</b></li> <li>swL2TrunkLACPPortState</li> </ul>	<b>Object name</b>	swL2TrunkLACPPortIndex
	<b>Object ID</b>	1.3.6.1.4.1.171.11.70.3.2.9.5.1.1
	<b>Module</b>	DGS3450-L2MGMT-MIB
	<b>Base syntax</b>	Integer
	<b>Composed syntax</b>	INTEGER
	<b>Access</b>	Read-Only
	<b>Status</b>	Current
	<b>Value list</b>	1 : 0..65535
	<b>Parent node</b>	swL2TrunkLACPPortEntry
	<b>First child</b>	None
<b>Description</b>	The index of logical port lacp.	

<ul style="list-style-type: none"> <li>swL2TrunkIndex</li> <li>swL2TrunkName</li> <li>swL2TrunkMasterPort</li> <li>swL2TrunkMember</li> <li>swL2TrunkFloodingPort</li> <li>swL2TrunkType</li> <li>swL2TrunkState</li> <li>swL2TrunkActivePorts</li> <li>swL2TrunkAlgorithm</li> <li>swL2TrunkLACPPortTable</li> <li>swL2TrunkLACPPortEntry</li> <li>swL2TrunkLACPPortIndex</li> <li><b>swL2TrunkLACPPortState</b></li> </ul>	<b>Object name</b>	swL2TrunkLACPPortState
	<b>Object ID</b>	1.3.6.1.4.1.171.11.70.3.2.9.5.1.2
	<b>Module</b>	DGS3450-L2MGMT-MIB
	<b>Base syntax</b>	Integer
	<b>Composed syntax</b>	INTEGER
	<b>Access</b>	Read-Write
	<b>Status</b>	Current
	<b>Value list</b>	1 : active(1) 2 : passive(2)
	<b>Parent node</b>	swL2TrunkLACPPortEntry
	<b>First child</b>	None
<b>Description</b>	The state of logical port lacp.	

<ul style="list-style-type: none"> <li>swL2TrunkIndex</li> <li>swL2TrunkName</li> <li>swL2TrunkMasterPort</li> <li>swL2TrunkMember</li> <li>swL2TrunkFloodingPort</li> <li>swL2TrunkType</li> <li>swL2TrunkState</li> <li>swL2TrunkActivePorts</li> <li><b>swL2TrunkAlgorithm</b></li> <li>swL2TrunkLACPPortTable</li> <li>swL2TrunkLACPPortEntry</li> <li>swL2TrunkLACPPortIndex</li> <li>swL2TrunkLACPPortState</li> <li>swL2MirrorMgmt</li> <li>swL2IGMPMgmt</li> <li>swL2TrafficSegMgmt</li> <li>swL2PlimitedMulticastMgmt</li> <li>swL2MgmtMIBTraps</li> <li>swL2VlanMgmt</li> <li>swL2LoopDetectMgmt</li> </ul>	<b>Object name</b>	swL2TrunkAlgorithm
	<b>Object ID</b>	1.3.6.1.4.1.171.11.70.3.2.9.4
	<b>Module</b>	DGS3450-L2MGMT-MIB
	<b>Base syntax</b>	Integer
	<b>Composed syntax</b>	INTEGER
	<b>Access</b>	Read-Write
	<b>Status</b>	Current
	<b>Value list</b>	1 : other(1) 2 : mac-source(2) 3 : mac-destination(3) 4 : mac-source-dest(4) 5 : ip-source(5) 6 : ip-destination(6) 7 : ip-source-dest(7)
	<b>Parent node</b>	swL2TrunkMgmt
	<b>First child</b>	None
<b>Description</b>	This object configures to part of the packet examined by the switch when selecting the egress port for transmitting load-sharing data.	