

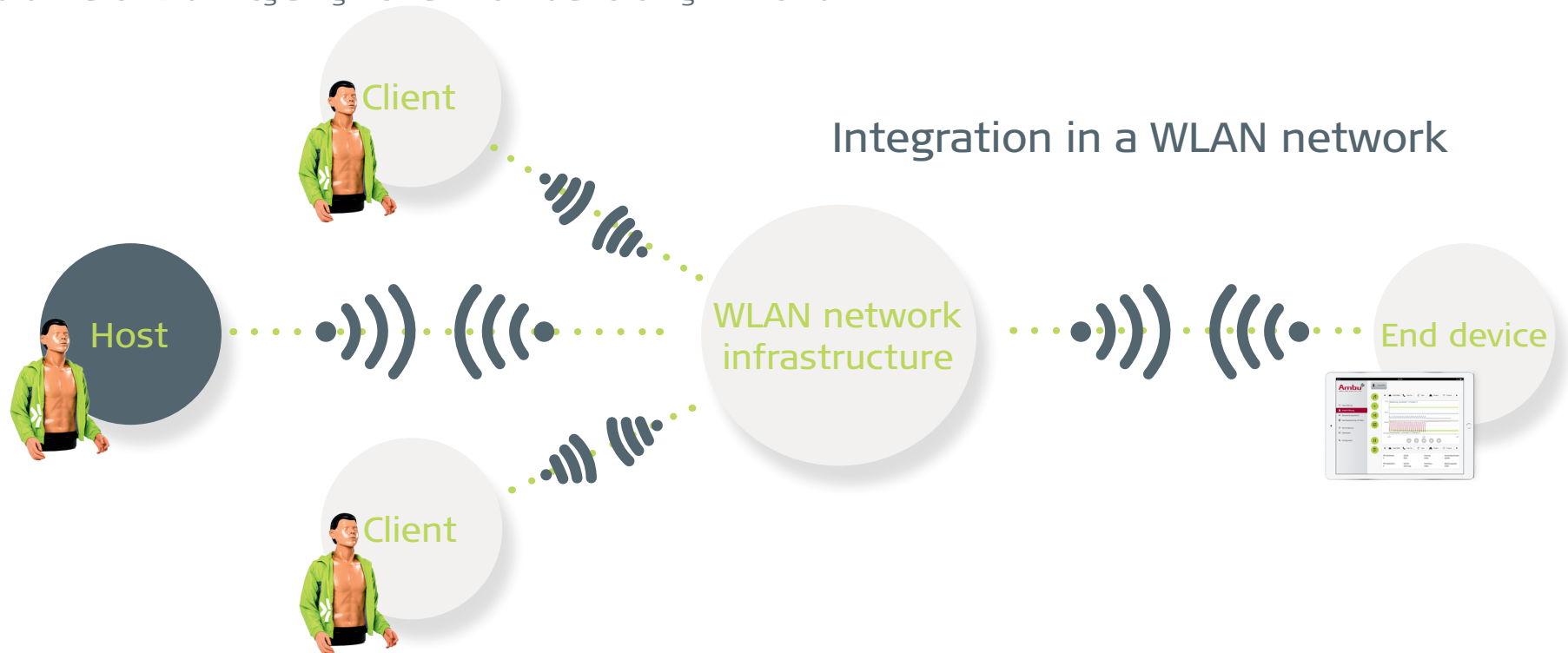
Quick Guide Ambu® Manikin Management Module

Network integration of manikins

In these instructions you will find out how to integrate one or more manikins (for group training) in an existing WLAN or LAN network infrastructure.

See section 1 and 1.1 for integrating the manikins into an existing WLAN network.

See section 2 and 2.1 for integrating the manikins into an existing LAN network.



Manikin mode: Host or Client (for Client manikins in group training)
Network mode: WLAN

DHCP/DNS: None
IP address: Free, static IP address in existing WLAN
Domain: Desired domain (e.g. Ambu.login)
Netmask: Subnet mask of existing WLAN

SSID: SSID of existing WLAN
Password: Password of existing WLAN (if available)
Encryption: Encryption of existing WLAN (if available)

For group training, the following points must be met:

- Interconnection of identical manikin models only
- Identical software version number on all devices
- Identical databases on all devices
- Identical SSID and password on all devices
- The sessions must no longer be active

Prior to configuring the manikins, please consider these points:

The manikins can be connected through LAN or WLAN, using the TCP/IP protocol, and it is possible to integrate them in an existing network infrastructure.

Note: It is recommended that only experienced IT personnel make changes to the network configuration.

When integrating a device into an existing network (via WLAN or LAN), there are the following options:

- The DHCP server of the network infrastructure assigns automatically a dynamic IP address to the device
- The device receives a static IP address that is assigned manually by the user

We recommend to assign a static IP address when integrating a training manikin into an existing network.

This setting allows the user to reach the manikin always with the same IP address via the browser.

If the DHCP server assigns dynamic IP addresses automatically, it is not easy to find out the correct IP address for each device and they can change constantly, e.g. after a restart.

In order to assign a static IP address, the following parameters must be known in advance:

- Free IP address in the IP address range of the network (one free IP address for each device to be connected)
- Subnet mask of the existing network


When working with a WLAN infrastructure, the name of the wireless network (SSID = Service Set Identifier) as well as the encryption and password of the WLAN must be known.

Note: If the network configuration of the manikin is set to invalid parameters, the manikin is not able to connect to the existing network. In order to access the manikin again, it must be reset by pressing the reset button using a pin.

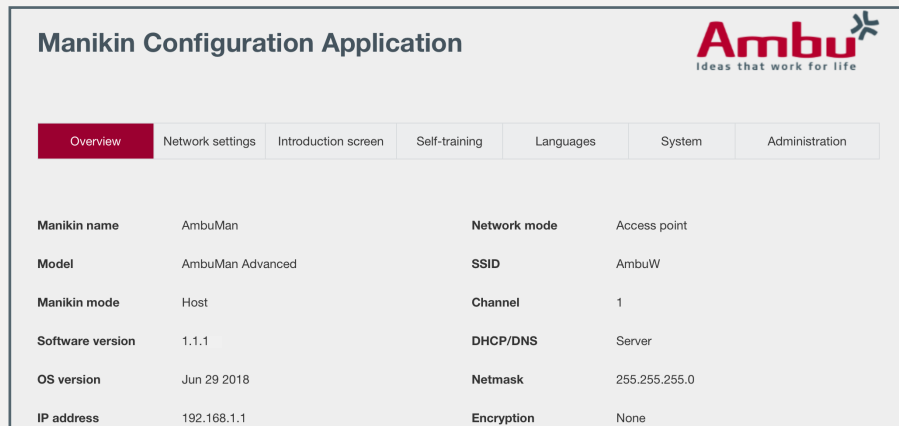
In the following configurations, make sure that all changes that are carried out in each tab are saved.
If you change tabs without saving the changes in advance, the changes will not be accepted.



1. Configuration of a Host training device (WLAN)

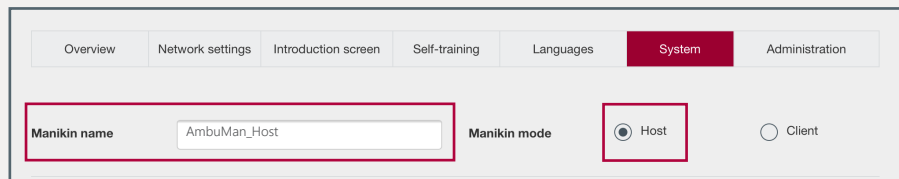


Start the training device and connect your end device with the training device. Finally, open the browser and enter **http://Ambu.login/config** or **192.168.1.1/config** into the address line in order to access the general configuration.




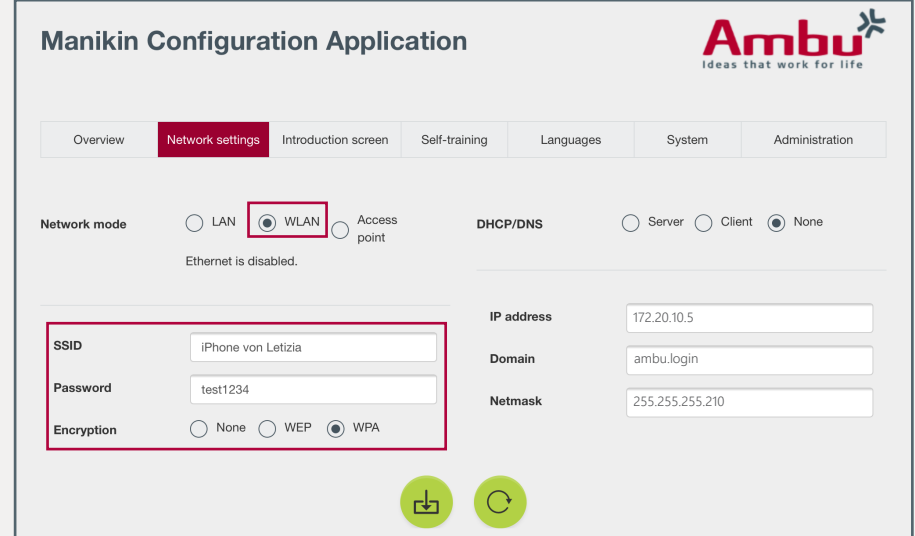
Manikin name	AmbuMan	Network mode	Access point
Model	AmbuMan Advanced	SSID	AmbuW
Manikin mode	Host	Channel	1
Software version	1.1.1	DHCP/DNS	Server
OS version	Jun 29 2018	Netmask	255.255.255.0
IP address	192.168.1.1	Encryption	None

You are now in the "Overview" tab where you can see the current network settings.



Manikin name **Manikin mode** Host Client

Click on the tab "System" to access the Host/Client settings. Select **Host** as the mode for the training device (set by default). Furthermore, you can rename the training device if needed. This is helpful when group training is carried out (see section 1.1). Finally, click on the "Save" button .





Network mode LAN WLAN Access point **DHCP/DNS** Server Client None

Ethernet is disabled.

IP address **Domain** **Netmask**

SSID **Password** **Encryption** None WEP WPA

In the next step, click on the "Network settings" tab. Here, specify **WLAN** as network mode to connect to an existing WLAN network, and enter the **SSID, password and encryption** of your existing WLAN network.

The **SSID** (Service Set Identifier) defines the name of your WLAN network in which you want to integrate the manikin. If this network is secured with an **encryption**, select the appropriate check box (WEP or WPA) and enter the correct **password**.

Note: If the SSID, password and encryption of the training device do not match with those of your WLAN network infrastructure, the training manikin will not be able to create a connection to your network.

Continuation: Configuration of a Host training device (WLAN)

Manikin Configuration Application



Overview **Network settings** Introduction screen Self-training Languages System Administration

Network mode LAN WLAN Access point
Ethernet is disabled.

DHCP/DNS Server Client None

IP address: 172.20.10.5
Domain: ambu.login
Netmask: 255.255.255.210

SSID: iPhone von Letizia
Password: test1234
Encryption: None WEP WPA



 

Now specify

- **None** as DHCP/DNS (to assign the IP address manually).

Enter a free and static **IP address** and a **domain** name where the manikin should be reachable within the network. Afterwards, enter also the **netmask** of your network.

Note: The IP address must be within the IP address range of the network and must not be used by other devices.
Note the static IP address and the manikin name.

Click on the "Save" button to store the settings  and restart the manikin by clicking on the "Restart" button .

Note: If the network configuration is set to invalid parameters, the manikin cannot be accessed and must be reset to default values by pressing the reset button using a pin.

If you want to perform group training, see the instructions to connect Client devices in section 1.1. Otherwise, go to section 3.


1.1 Configuration of Client training devices (WLAN)

If you want to perform group training, follow these steps for each Client manikin.

Start the training device, connect to it and access the Manikin Configuration, as described in section 1.

Overview Network settings Introduction screen Self-training Languages **System** Administration

Manikin name: AmbuMan_Client_1
Manikin mode: Host Client

Click on the tab "System" to access the Host/Client settings. Here, select **Client** as manikin mode and rename the training device in order to be able to identify it later on. Finally, click on the "Save" button .

Manikin Configuration Application



Overview **Network settings** Introduction screen Self-training Languages System Administration

Network mode LAN WLAN Access point
Ethernet is disabled.

DHCP/DNS Server Client None

IP address: 172.20.10.6
Domain: ambu.loginClient1
Netmask: 255.255.255.210

SSID: iPhone von Letizia
Password: test1234
Encryption: None WEP WPA

In the next step, click on the "Network settings" tab, set the network mode to **WLAN** and enter again the **SSID**, **encryption** and **password** of your existing WLAN network.

Continuation: Configuration of Client training devices (WLAN)

Manikin Configuration Application

Overview **Network settings** Introduction screen Self-training Languages System Administration

Network mode LAN WLAN Access point
Ethernet is disabled.

DHCP/DNS Server Client None

SSID: iPhone von Letizia



Password: test1234

Encryption: None WEP WPA

IP address: 172.20.10.6

Domain: ambu.loginClient1

Netmask: 255.255.255.210



 

Now specify

- **None** as DHCP/DNS (to assign the IP address manually).

Enter the next free and static **IP address** and a **domain** name where the manikin should be reachable within the network. Afterwards, enter also the **netmask** of your network.

Note: The IP address must be within the IP address range of the network and must not be used by other devices. Each training device receives a different static IP address. Note the static IP address and the manikin name.

Click on the "Save" button to store the settings  and restart the manikin by clicking on the "Restart" button .

Note: If the network configuration is set to invalid parameters, the manikin will not be able to connect to your network and cannot be accessed. It must be reset to default values by pressing the reset button using a pin. After that, the Client configuration must be repeated.

As mentioned in the introduction on page 2, you have also the possibility to let the server automatically assign IP addresses to the training devices. Therefore, set **Client** as DHCP/DNS.

Note: This is not recommended in general because the IP address will change constantly (e.g. after a restart). But it is possible when configuring Client manikins in group training. The Host manikin allows you to see all Client manikins that are connected in the same existing network with their automatically assigned IP address.

Therefore, connect to the Host training device, access the Manikin Configuration (e.g. here 172.20.10.5/**config**) and click on the tab "Network settings".

Overview **Network settings** Introduction screen Self-training Languages System Administration

Network mode LAN WLAN Access point
Ethernet is disabled.

DHCP/DNS Server Client None

SSID: iPhone von Letizia



Password: test1234

Encryption: None WEP WPA

IP address: 172.20.10.5

Domain: ambu.login

Netmask: 255.255.255.210

Connected manikins

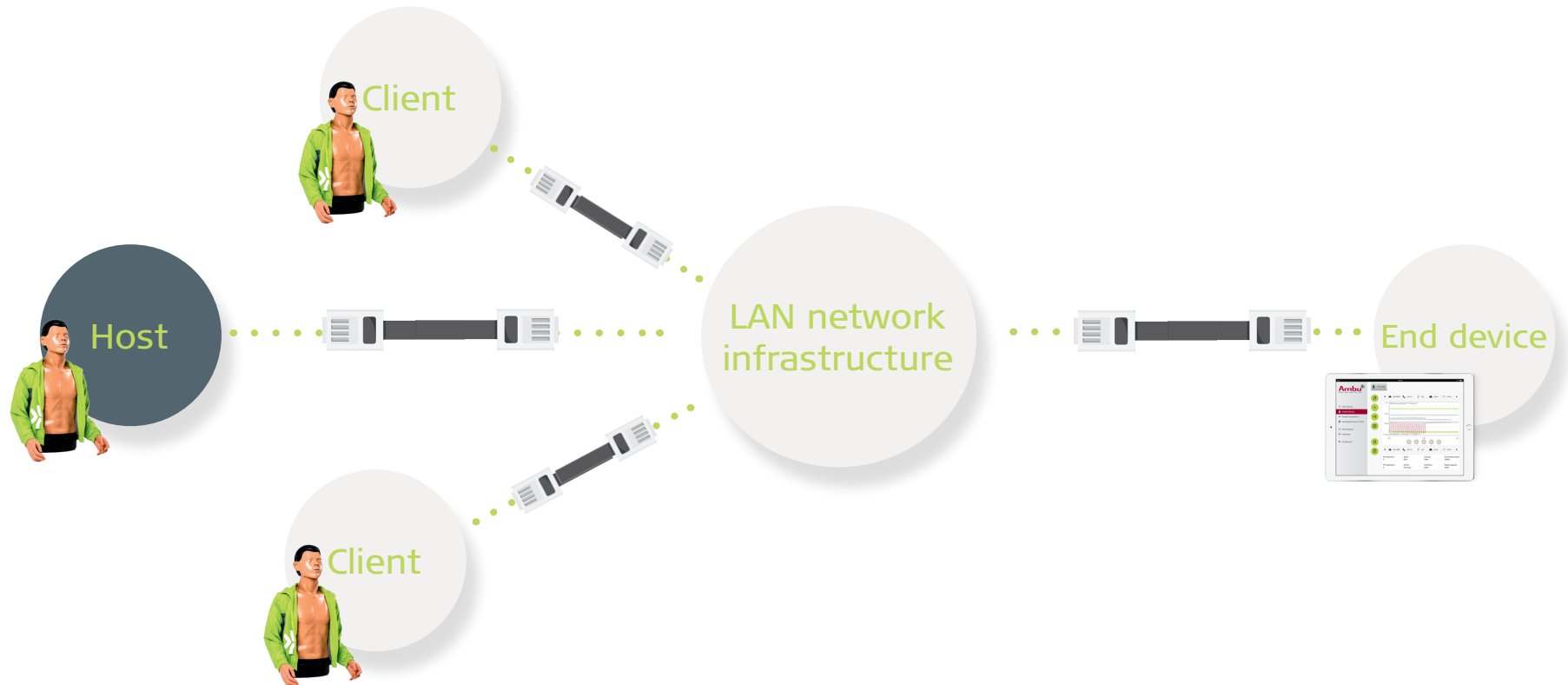
Name	IP address
AmbuMan_Host	172.20.10.5
AmbuMan_Client_1	172.20.10.6
AmbuMan_Client_2	172.20.10.7

At the end of the page you will find a list of the names and IP addresses of all Client training devices that are connected within the same network (the Host is first on the list).

With the IP addresses you can access the Manikin Configuration of each Client manikin (e.g. 172.20.10.7/**config**).

Now, the settings of the Client devices can be changed (see section 5).

Integration in a LAN network

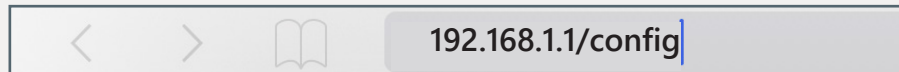


Manikin mode:	Host or Client (for Client manikins in group training)
Network mode:	LAN
DHCP/DNS:	None
IP address:	Free, static IP address in existing LAN
Domain:	Desired domain (e.g. Ambu.login)
Netmask:	Subnet mask of existing LAN

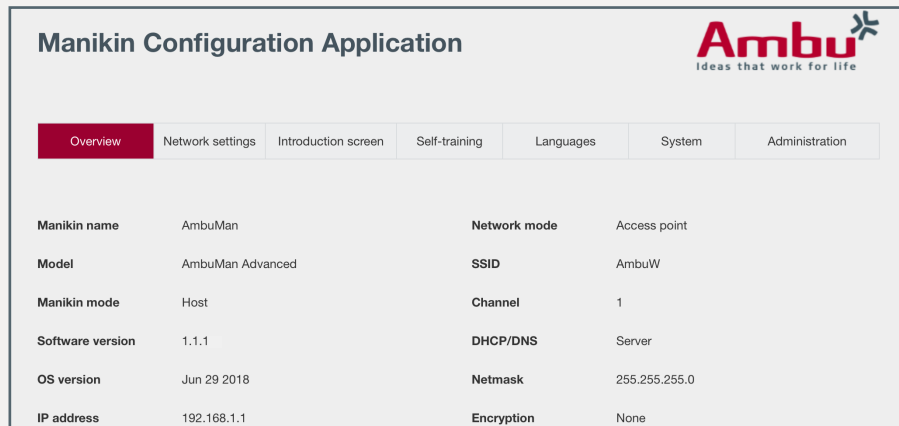
For group training, the following points must be met:

- Interconnection of identical manikin models only
- Identical software version number on all devices
- Identical databases on all devices
- The sessions must no longer be active

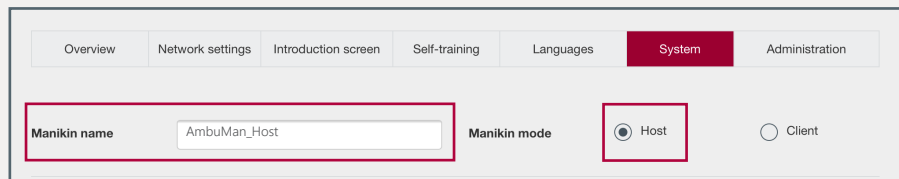
2. Configuration of a Host training device (LAN)




Start the training device and connect your end device with the training device. Finally, open the browser and enter **http://Ambu.login/config** or **192.168.1.1/config** into the address line in order to access the general configuration.

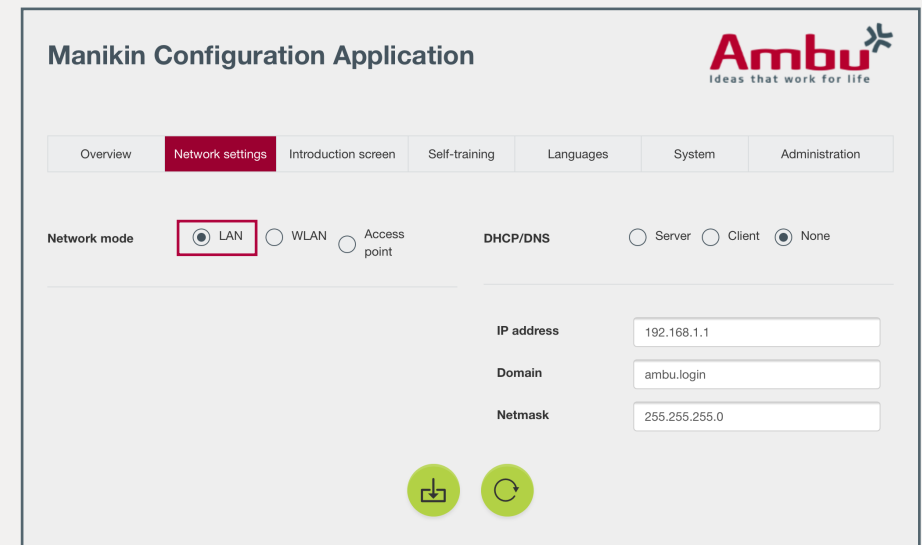


You are now in the "Overview" tab where you can see the current network settings.



Click on the tab "System" to access the Host/Client settings. Select **Host** as the mode for the training device (set by default). Furthermore, you can rename the training device if needed. This is helpful when group training is carried out (see section 2.1). Finally, click on the "Save" button .

In the next step, click on the "Network settings" tab. Here, specify **LAN** as network mode to connect to an existing LAN network.



Note: Now connect the manikin with an Ethernet cable via LAN to your network infrastructure where it should be integrated. Connect also your end-device to the network infrastructure.

Continuation: 2. Configuration of a Host training device (LAN)

Manikin Configuration Application

Overview **Network settings** Introduction screen Self-training Languages System Administration



Network mode LAN WLAN Access point

DHCP/DNS Server Client None

IP address: 192.168.1.19

Domain: ambu.login

Netmask: 255.255.255.0



 

Now specify

- **None** as DHCP/DNS (to assign the IP address manually).

Enter a free and static **IP address** and a **domain** name where the manikin should be reachable within the network. Afterwards, enter also the **netmask** of your network.

Note: The IP address must be within the IP address range of the network and must not be used by other devices.
Note the static IP address and the manikin name.

Click on the "Save" button to store the settings  and restart the manikin by clicking on the "Restart" button .

Note: If the network configuration is set to invalid parameters, the manikin cannot be accessed and must be reset to default values by pressing the reset button using a pin.

If you want to perform group training, see the instructions to connect Client devices in section 2.1. Otherwise, go to section 3.

2.1 Configuration of Client training devices (LAN)


If you want to perform group training, follow these steps for each Client manikin.

Start the training device, connect to it and access the Manikin Configuration, as described in section 2.

Overview Network settings Introduction screen Self-training Languages **System** Administration

Manikin name: AmbuMan_Client_1

Manikin mode Host Client

Click on the tab "System" to access the Host/Client settings. Here, select **Client** as manikin mode and rename the training device in order to be able to identify it later on. Finally, click on the "Save" button .

Manikin Configuration Application

Overview **Network settings** Introduction screen Self-training Languages System Administration



Network mode LAN WLAN Access point

DHCP/DNS Server Client None

IP address: 192.168.1.1

Domain: ambu.login

Netmask: 255.255.255.0

In the next step, click on the "Network settings" tab and set the network mode to **LAN**.

Continuation: 2.1 Configuration of Client training devices (LAN)



Manikin Configuration Application

Overview **Network settings** Introduction screen Self-training Languages System Administration

Network mode LAN WLAN Access point

DHCP/DNS Server Client None

IP address: 192.168.1.20
Domain: ambu.login
Netmask: 255.255.255.0



 

Now specify

- **None** as DHCP/DNS (to assign the IP address manually).

Enter the next free and static **IP address** and a **domain** name where the manikin should be reachable within the network. Afterwards, enter also the **netmask** of your network.

Note: The IP address must be within the IP address range of the network and must not be used by other devices. Each training device receives a different static IP address. Note the static IP address and the manikin name.

Click on the "Save" button to store the settings  and restart the manikin by clicking on the "Restart" button .

Note: If the network configuration is set to invalid parameters, the manikin will not be able to connect to your network and cannot be accessed. It must be reset to default values by pressing the reset button using a pin. After that, the Client configuration must be repeated.

As mentioned in the introduction on page 2, you have also the possibility to let the server automatically assign IP addresses to the training devices. Therefore, set **Client** as DHCP/DNS.

Note: This is not recommended in general because the IP address will change constantly (e.g. after a restart). But it is possible when configuring Client manikins in group training. The Host manikin allows you to see all Client manikins that are connected in the same existing network with their automatically assigned IP address.

Therefore, connect to the Host training device, access the Manikin Configuration and click on the tab "Network settings".



Manikin Configuration Application

Overview **Network settings** Introduction screen Self-training Languages System Administration

Network mode LAN WLAN Access point

DHCP/DNS Server Client None

IP address: 192.168.1.19
Domain: ambu.login
Netmask: 255.255.255.0

Connected manikins	
Name	IP address
AmbuMan_Host	192.168.1.19
AmbuMan_Client_1	192.168.1.20
AmbuMan_Client_2	192.168.1.21

At the end of the page you will find a list of the names and IP addresses of all Client training devices that are connected within the same network (the Host is first on the list).

With the IP addresses you can access the Manikin Configuration of each Client manikin (e.g. 192.168.1.21/**config**).

Now, the settings of the Client devices can be changed (see section 5).

3. Start a new training on the integrated manikins

To start a new training, turn the Host manikin (and all other Client manikins) on and wait until the LED light stops flashing.

Then, connect your end device to the existing network (WLAN or LAN) where the manikins were integrated to.

Open the browser and enter the assigned IP address (or domain name) of the Host manikin into the address bar.

Now, you see the start screen of the Ambu Manikin Management Module where you can access the "Controlled Session" by clicking on the appropriate button.



When group training should be performed, proceed here:

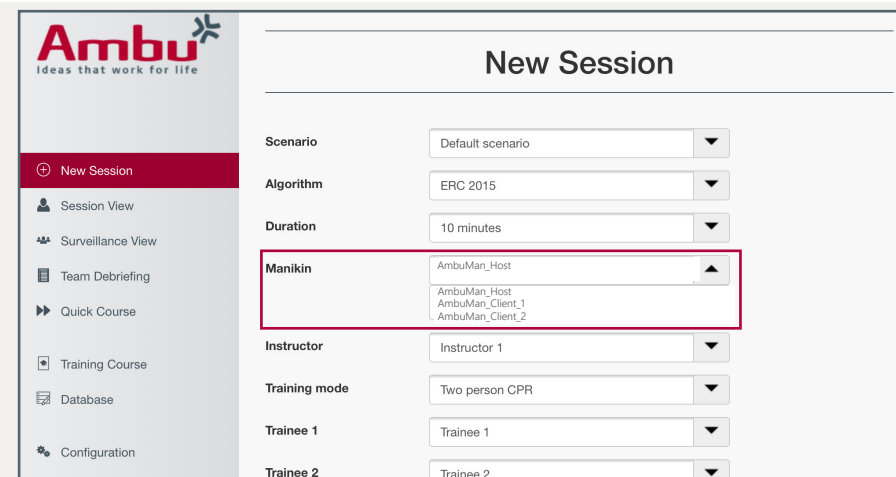
You have two possibilities to start a new session:

- The "Quick Course" (see below)
- The manual start of devices (see section 4)

Quick Course

If you want to start several manikins quickly at the same time, select the "Quick Course" from the menu bar on the left. For further information see the Quick Guide "Quick Course: Start several manikins at the same time".

4. Group training: Start sessions manually

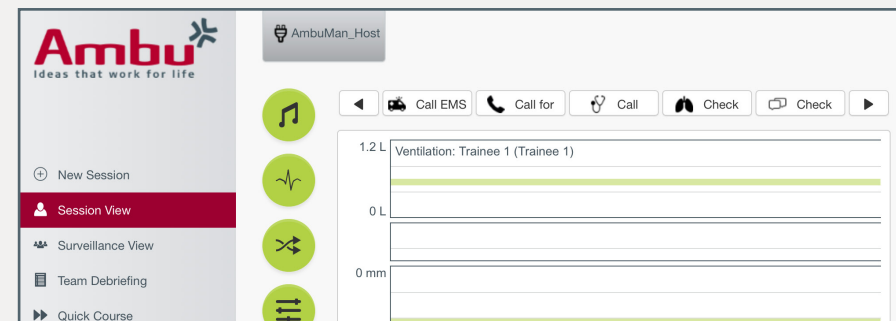


To start the sessions manually on each training device, go to the "New Session" view and select all parameters and one manikin.

Click on the "Play" button  and repeat this for all other devices.

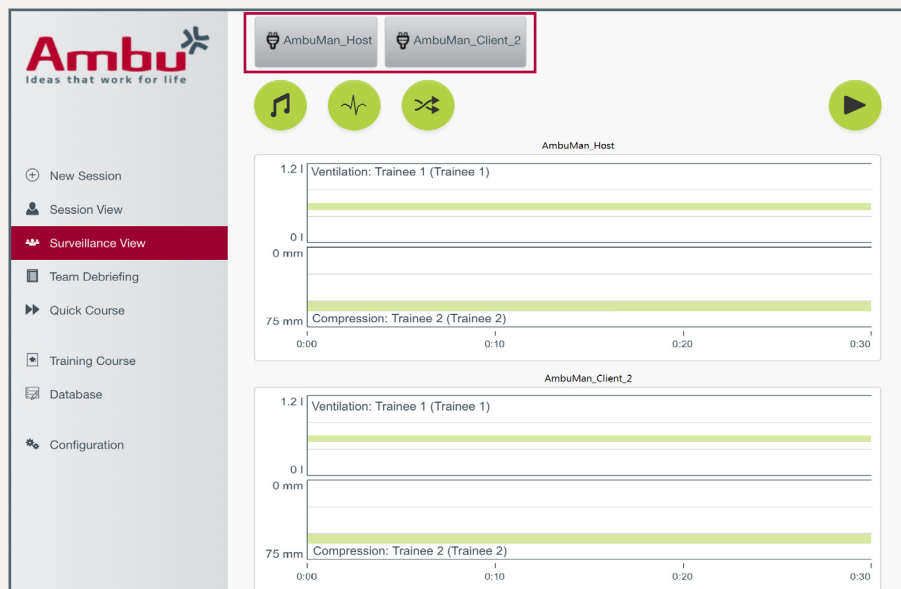
Note: Training devices that already have an active session will be grey and cannot be selected for a new session.

If you have started a session on several training devices, you can view the sessions in the tab "Session View" or "Surveillance View".



Under "Session View", you see the session of a single training device and you can switch between all connected training devices by clicking on the grey buttons in the upper part of the display with the respective device name on it.


Continuation: Group training: Start sessions manually



In the "Surveillance View", on the other hand, you get an overview of all connected training devices on which a session is running.

Note: The more devices are displayed, the smaller the graphs become.

Select the manikins by clicking on the grey buttons in the upper display with the device name on it and make settings or pause the training with the appropriate buttons.

To end a session, go to the menu tab "Session View", select the device with the grey button and click on the "Exit" button .

5. Reconfiguration of training devices

If you want to reconfigure the Host or Client training devices, you can access the Manikin Configuration of each manikin with the assigned IP address via your browser.

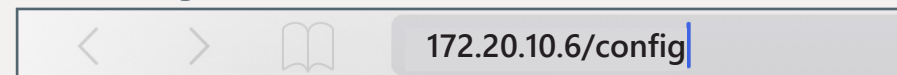
Therefore, it is required to be connected with your end device to the network the manikins were integrated to (WLAN or LAN).

Note: If you have set Client manikins to receive a dynamic IP address from the server, it is recommended to change first the settings of all Client manikins before changing the Host manikin, so you are able to see the IP addresses of the Client manikins if you have not noted them down.

Access the Host manikin and go to the Manikin Configuration. Now click on the tab "Network settings" and see the list of all connected manikins at the end of the page.

Name	IP address
AmbuMan_Host	172.20.10.5
AmbuMan_Client_1	172.20.10.6
AmbuMan_Client_2	172.20.10.7

Type the IP address of the Client device you want to reprogram into the address bar of the browser and add **/config** to access directly the Manikin Configuration.



To reset the settings of a training device, go to the menu tabs "System" and "Network settings" and make the adjustments, depending on what you want to set up on the training device.