You can do a simple set up to connect to raspberrpi using your laptop without a HDMI cable. However you will need to use HDMI cable and a screen for the initial set up.

1. Install Rasbian on pi using instructions from the rpi webpage
2. Edit contents of /etc/network/interfaces file to look like this You can use any essid you want. Note : this works only for unsecured networks. For networks which needs password, follow this guide.

http://weworkweplay.com/play/automatically-connect-a-raspberry-pi-to-a-wifi-network/

auto lo

iface lo inet loopback

iface eth0 inet dhcp

auto wlan0

allow-hotplug wlan0

iface wlan0 inet dhcp

wireless-essid Columbia University

1. You can set up a static ip as mentioned in the guide above. However there is an elegant solution without having to do that. We can use a python script to email your ip address every time pi is connected.
2. http://elinux.org/RPi\_Email\_IP\_On\_Boot\_Debian

Follow the above page instructions. It is very straightforward.

You will need to edit part of the script to add your email id and password. Script works only for gmail accounts

to = 'me@example.com' // email id to which you want ip address to be sent

gmail\_user = 'test@gmail.com' // email id from which you want to sent it . this can be same as ‘to’ email id

gmail\_password = 'yourpassword'//gmail password

1. However you might need to put a sleep 30 in the /etc/rc.local file at the start of the script. The script will look like this.

# rc.local

#

# This script is executed at the end of each multiuser runlevel.

# Make sure that the script will "exit 0" on success or any other

# value on error.

#

# In order to enable or disable this script just change the execution

# bits.

#

sleep 30

\_IP=$(hostname -I) || true

if [ "$\_IP" ]; then

printf "My IP address is %s\n" "$\_IP"

python /home/pi/Code/startup\_mailer.py

fi

exit 0

1. Reboot your pi , connect it to your laptop using a usb cable( this is to power rpi ) , ip address will be sent to your email id.
2. You can either ssh into pi from your laptop using ssh –X pi@<ipaddress>

Or set up a vncserver on pi.

You can use this guide to set up vnc on your pi

http://elinux.org/RPi\_VNC\_Server

1. Now you can use vncviewer to connect to rpi