

## CSMA-CD Exp 4:

device → interfaces → Physical layer → Radio Type → abstract



MAC Layer → Generic MAC

channel Access mode → CSMA

Apply → OK

duplicate the device → 10 times  
Ctrl + A



→ Hub

↳ properties → general

↳ MAC Pro

↳  $802.3 \text{ B} \cdot \text{W} = \underline{10 \text{ Mbps}}$

Apply → OK

Applications → CBR → create traffic

Table view → Applications → Ctrl A

↳ items to send = 10,000

↳ interval = 1 micro-seconds

↳ End time = 5 seconds



(Analyse statistics at current scenario)

MAC (Data link layer)

↳ 802.3

(Retransmissions and no. of packets dropped)

## CSMA-CA

scenario-properties → Terrain → 500 x 500  
(same radio range)

device → interfaces → Physical layer → Radio Type → 802.11b Radio

MAC Layer → Generic MAC

channel Access mode → CSMA-CA

Enable-CTS → ✓

Enable-RTS → ✓

Retry limit → 5



↳ properties

↳ Physical → 802.11b

↳ MAC → Generic MAC

↳ CSMA-CA

↳ RTS/CTS - ✓

↳ Ack - ✓

↳ Retry limit - 5

CBR or mix with FTP

Table view → Applications → Group CBR properties

↳ items to send = 10,000

↳ item size = 512

↳ ~~start~~ interval = 1 second

↳ End time = 5 seconds

Exp 6:

CLI: > en

> config t

> interface fa0/0

> ip address

> no shut

192.168.1.1 255.255.255.0

> clock rate 64000

no shut after clock rate

> exit

> ip route

192.168.3.0

255.255.255.0

192.168.2.2