

# Kendala Kerjasama

## ➤ Faktor bahasa

- Perbedaan bahasa

## ➤ Biaya

- Dana tdk cukup untuk pinjar antar perpustakaan

## ➤ Sikap perpustakaan

- Perpustakaan besar kurang bersemangat kerjasama dengan perpustakaan kecil

## ➤ Geografi

- Wilayah yang terlalu luas

## ➤ Politik

- Instabilitas politik

# Kendala Kerjasama Jaringan Informasi

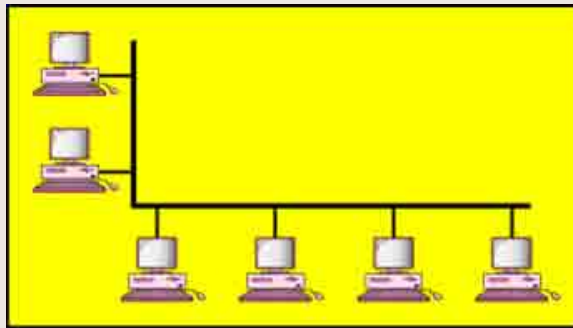
- Beban kerja yang tidak seimbang
- Belum ada undang-undang mengatur kerjasama jaringan
- Keuangan
- Kebutuhan informasi yang berlainan
- SDM

# Jaringan Komputer

- Stand-alone system
- Online system
- Off-line system
- Modem

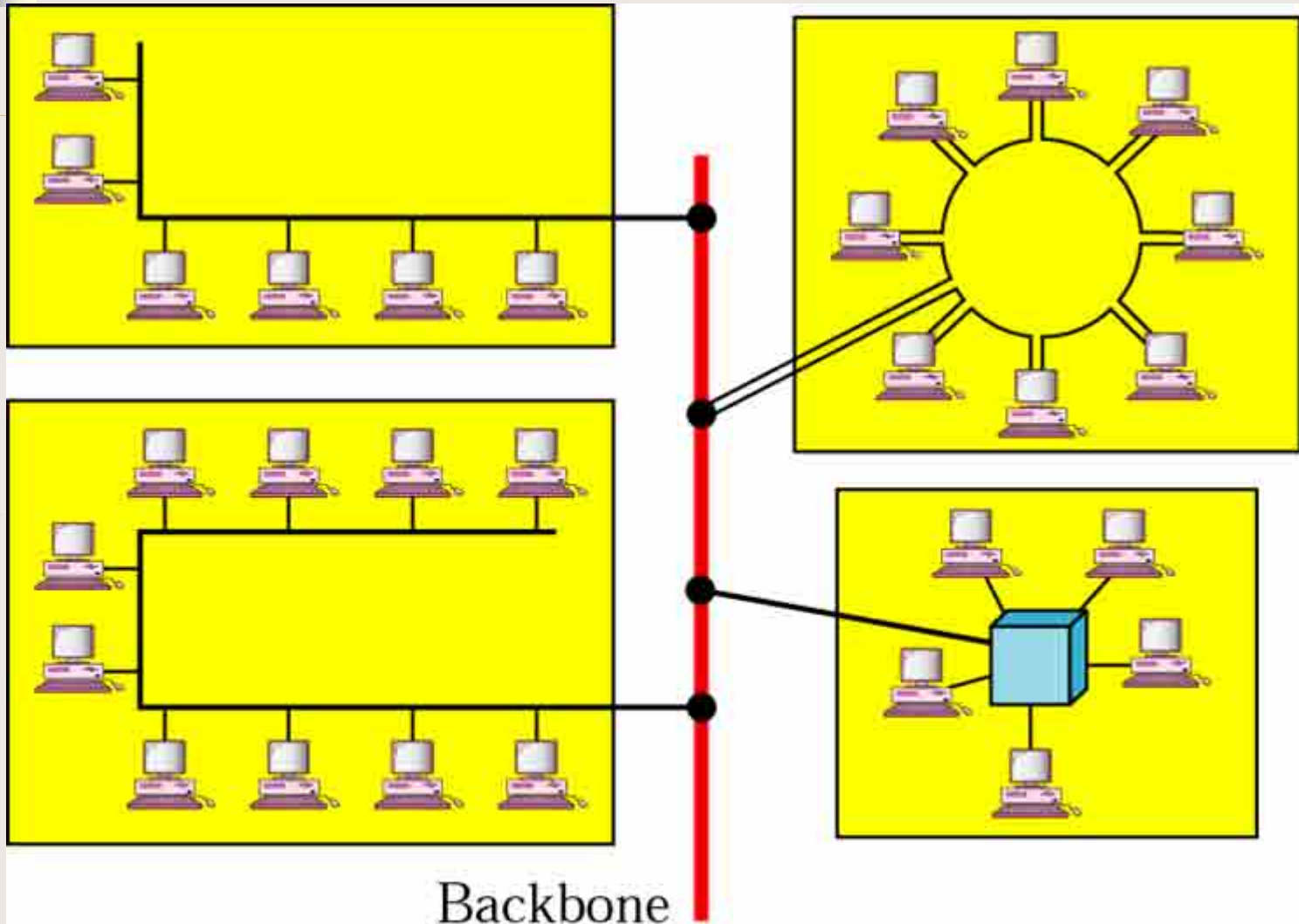
# LAN

- LAN usually privately owned and links devices in a single office, building or campus.
- It depends on the needs and typically limited to a few kilometers
- The major purpose is to allow sharing of resources (h/w and s/w)
- Common topologies are bus, ring and star
- Data rates usually in range 4 to 16 Mbps; can reach even 100Mbps



a. Single-building LAN

# *LAN (Continued)*

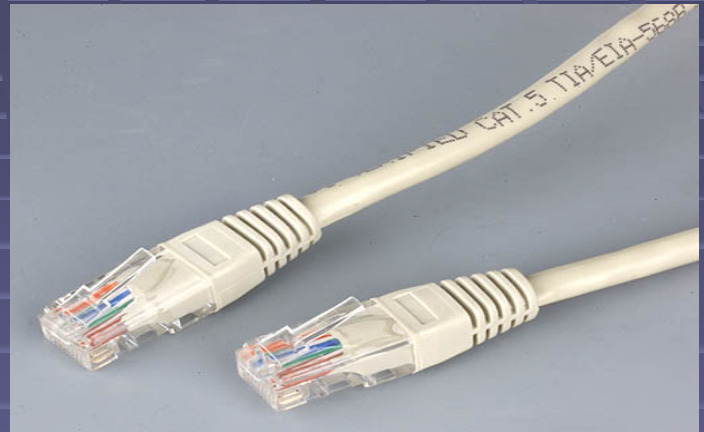


b. Multiple-building LAN

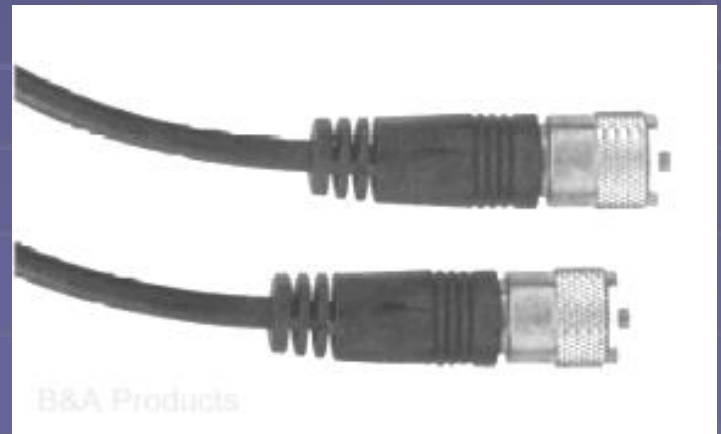
# Komponen LAN

- Medium sambungan
- Interface (antarmuka), menghubungkan workstation dengan kabel
- Workstation
- Server

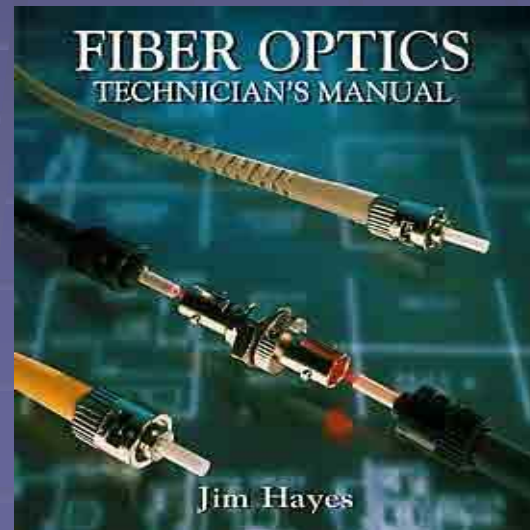
- Twisted Pair  
(kabel puntir)



- Coaxial cable  
(kabel sesumbu)

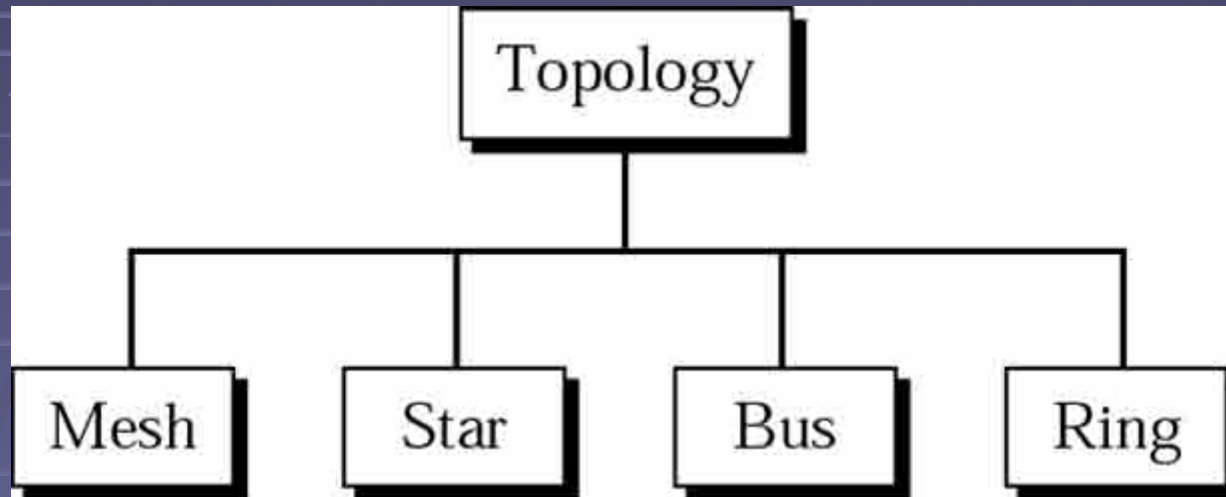


- Fiber Optics  
(serat optik)



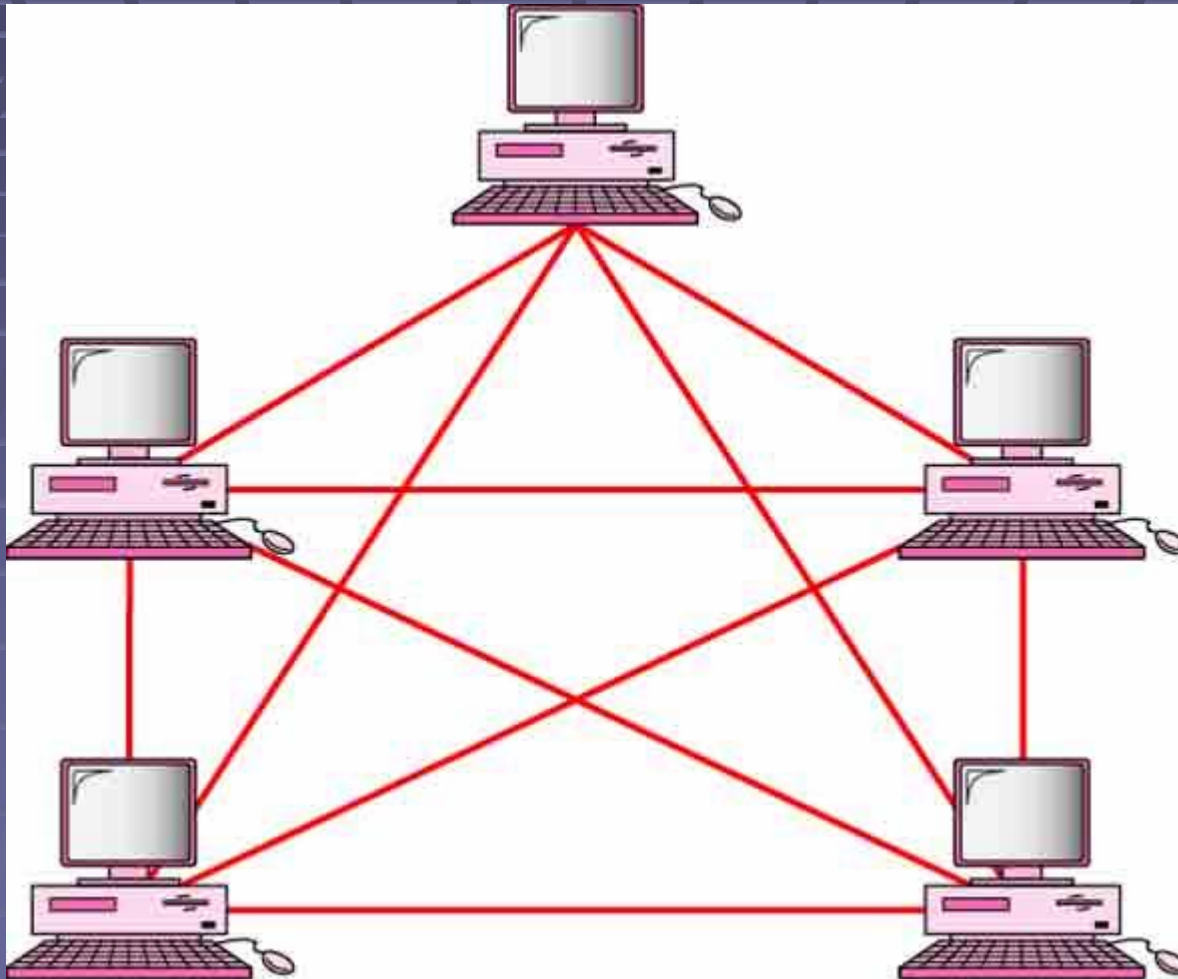


# *Categories of topology*

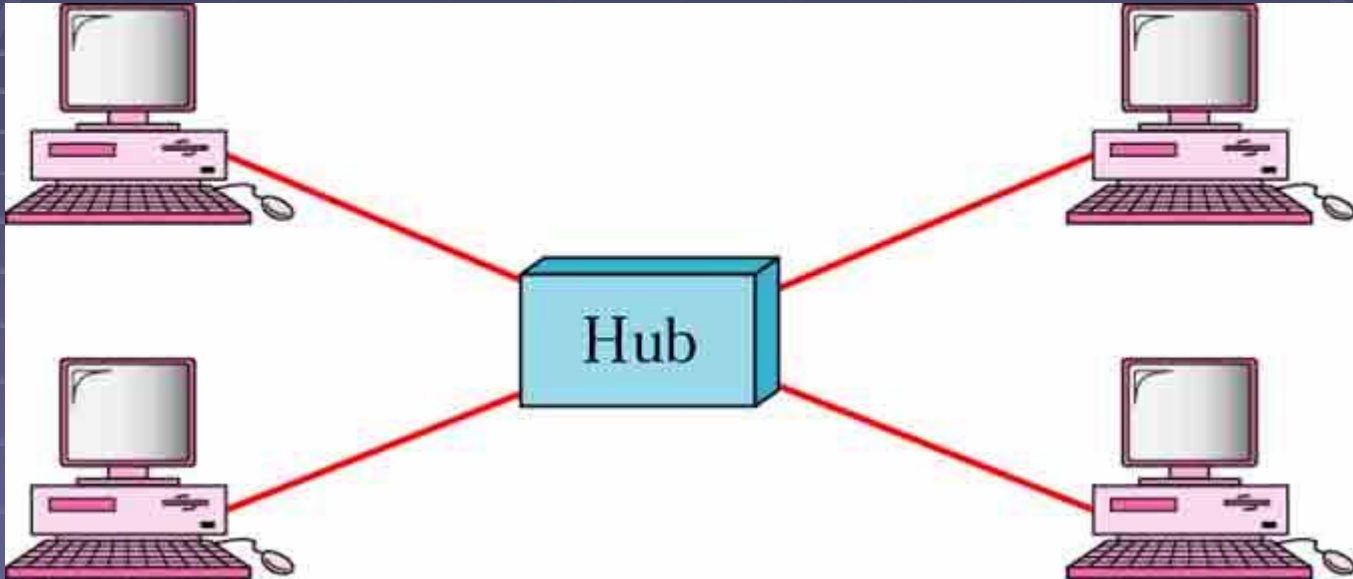


# *Fully connected mesh topology (for five devices)*

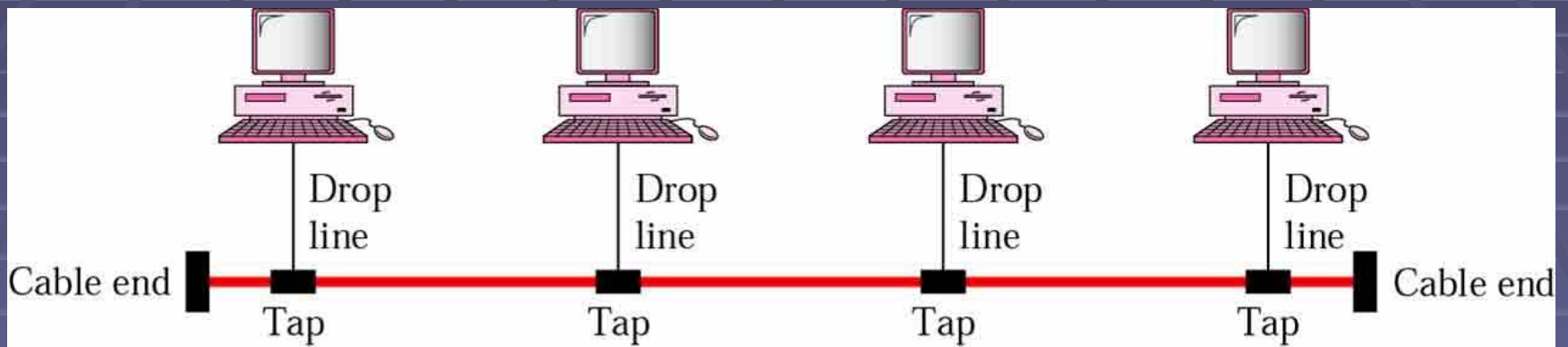
**Number of links =  $n(n-1)/2$   
(for n number of devices)**



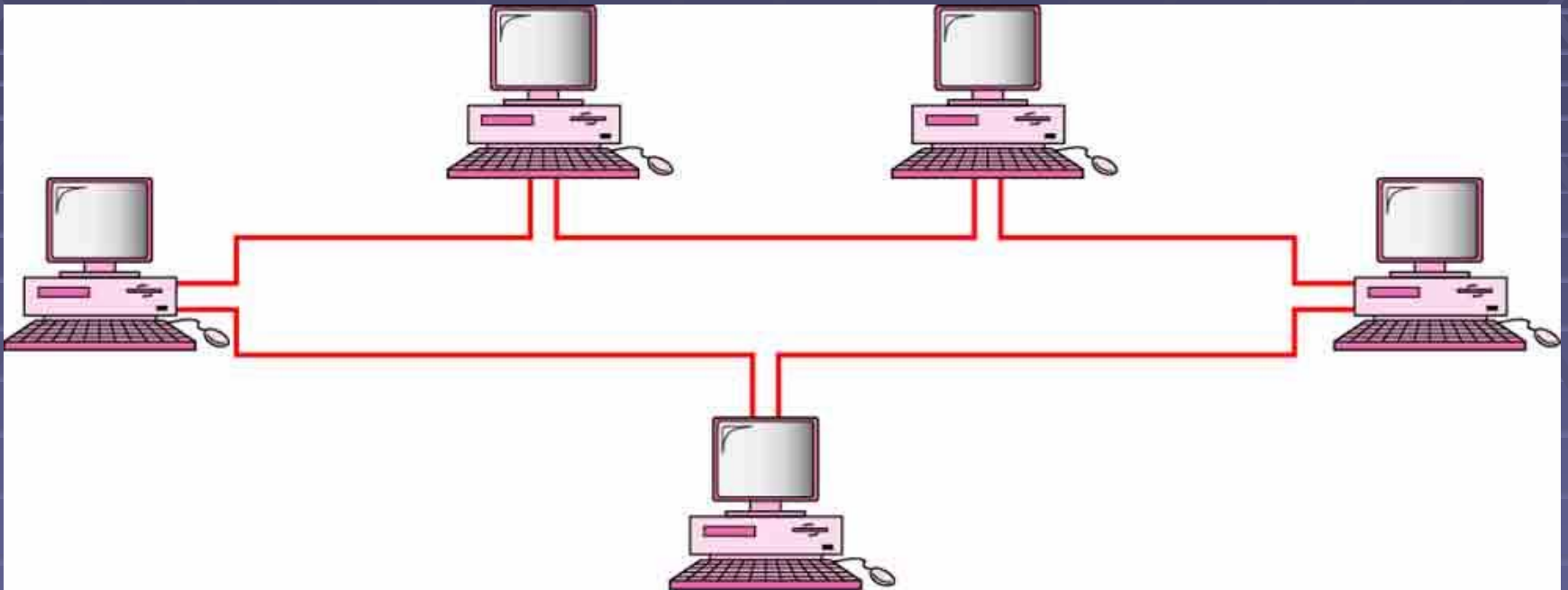
# *Star topology*



# *Bus topology*

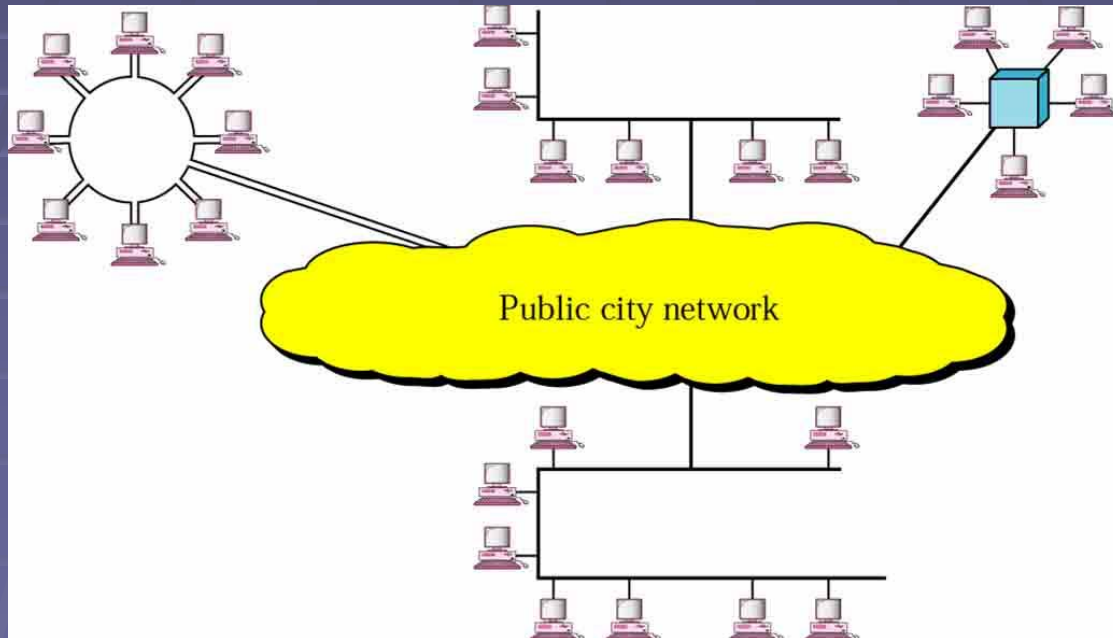


# *Ring topology*



# MAN

- MAN is designed to extend over an entire city. It could be a single network such as cable tv network, or comprises of many LAN's



# WAN

- WAN provides long-distance transmission of data, voice, image and video information over large geographic areas

