

```
#APARTADO A: Almacenamos los vectores citados
```

```
v=c(2.5,4,8)
u=runif(3,2,6)
w=seq(9,13,2)
A=cbind(v,u,w)
```

```
#Creamos las variables que nos proporcionarán el output pedido
```

```
max=0
imax=0
jmax=0
```

```
#APARTADO B: Empleamos dos bucles anidados, recorriendo cada componente de la matrix
```

```
for (i in 1:length(v)){
for (j in 1:length(v)){
if (A[i,j]>max){
max=A[i,j]
imax=i
jmax=j#Almacenamos los vectores citados
v=c(2.5,4,8)
u=runif(3,2,6)
w=seq(9,13,2)
A=cbind(v,u,w)
#Creamos las variables que nos proporcionarán el output pedido
max=0
imax=0
jmax=0
#Empleamos dos bucles anidados, recorriendo cada componente de la matrix
for (i in 1:length(v)){
for (j in 1:length(v)){
if (A[i,j]>max){
max=A[i,j]
imax=i
jmax=j
}
}
}
#Para calcular A^2 creamos la matriz nula B
B=matrix(0,ncol=3,nrow=3)
for (i in 1:length(v)){
for (j in 1:length(v)){
for (k in 1:length(v)){
B[i,j]=B[i,j]+A[i,k]*A[k,j]
}
}
}
}
}
```

```
#Inicializamos el vector X
```

```
X=c(0)
xmax=0
for (i in 1:length(v)){
for (j in 1:length(v)){
if (j==i){
X[i]=B[i,j]
print(i)
if (X[i]>xmax){
xmax=X[i]
}
}
}
}
}
```

```
#APARTADO C: Para calcular A^2 creamos la matriz nula B
```

```
B=matrix(0,ncol=3,nrow=3)
for (i in 1:length(v)){
```

```
for (j in 1:length(v)){
for (k in 1:length(v)){
B[i,j]=B[i,j]+A[i,k]*A[k,j]
}
}
}
```

#APARTADO D: Inicializamos el vector X y xmax

```
X=c(0)
xmax=0
for (i in 1:length(v)){
for (j in 1:length(v)){
if (j==i){
X[i]=B[i,j]
if (X[i]>xmax){
xmax=X[i]
}
}
}
}
}
```