
```
%Ejercicio 1%
%Calcula la raíz séptima de z%
m=msgbox('Calcula la raíz séptima del complejo z=4*180°','Ejercicio
1');

%valores%
m2='Valores a tomar en cuenta';
z=4*(cos(pi)+i*sin(pi))
arg=angle(z)
r=abs(z)
n=7

%Cálculo de resultados%
m3='Cálculos';
k=0;
z0=r^(1/n)*exp((arg+2*k*pi)/(n)*1i)

k=1;
z1=r^(1/n)*exp((arg+2*k*pi)/(n)*1i)

k=2;
z2=r^(1/n)*exp((arg+2*k*pi)/(n)*1i)

k=3;
z3=r^(1/n)*exp((arg+2*k*pi)/(n)*1i)

k=4;
z4=r^(1/n)*exp((arg+2*k*pi)/(n)*1i)

k=5;
z5=r^(1/n)*exp((arg+2*k*pi)/(n)*1i)

k=6;
z6=r^(1/n)*exp((arg+2*k*pi)/(n)*1i)

%Comprobación%
Cz0=z0^7
Cz1=z1^7
Cz2=z2^7
Cz3=z3^7
Cz4=z4^7
Cz5=z5^7
Cz6=z6^7

%Graficación%
m4='Gráfica';
compass([z0,z1,z2,z3,z4,z5,z6])

hold on;
plot([z0,z1,z2,z3,z4,z5,z6,z0])

z =
```

$$-4.0000 + 0.0000i$$

$$\arg =$$

$$3.1416$$

$$r =$$

$$4$$

$$n =$$

$$7$$

$$z0 =$$

$$1.0983 + 0.5289i$$

$$z1 =$$

$$0.2713 + 1.1885i$$

$$z2 =$$

$$-0.7600 + 0.9531i$$

$$z3 =$$

$$-1.2190 + 0.0000i$$

$$z4 =$$

$$-0.7600 - 0.9531i$$

$$z5 =$$

$$0.2713 - 1.1885i$$

$$z6 =$$

$$1.0983 - 0.5289i$$

$$Cz0 =$$

$$-4.0000 + 0.0000i$$

$$Cz1 =$$

$$-4.0000 + 0.0000i$$

$$Cz2 =$$

$$-4.0000 + 0.0000i$$

$$Cz3 =$$

$$-4.0000 + 0.0000i$$

$$Cz4 =$$

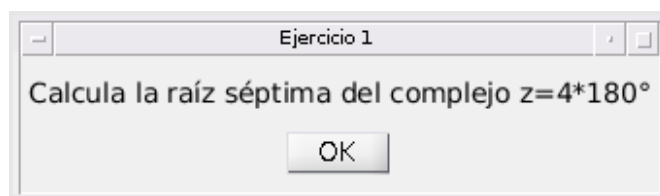
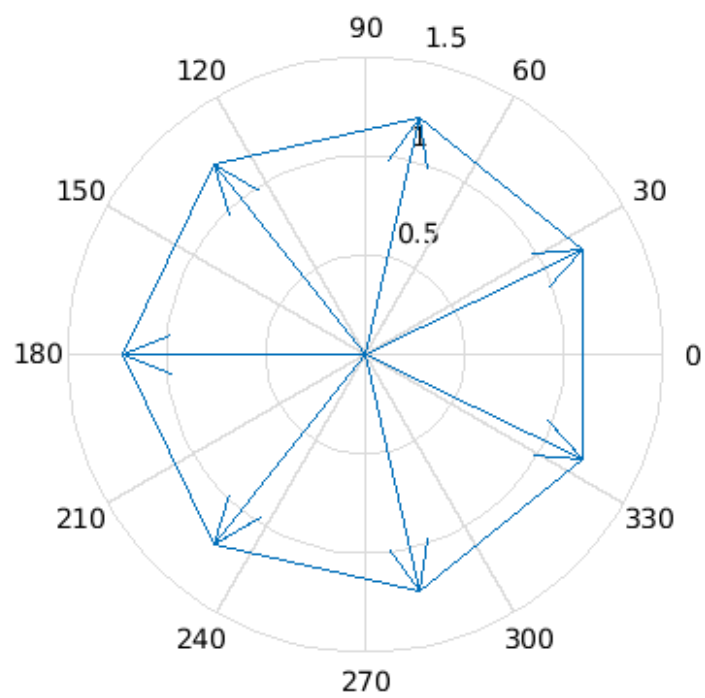
$$-4.0000 + 0.0000i$$

$$Cz5 =$$

$$-4.0000 + 0.0000i$$

$$Cz6 =$$

$$-4.0000 - 0.0000i$$



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