Writing Terms of a
Geometric Sequence

Given the function/explicit rule write the first 5 terms of the function

$$
\text { 1. } \mathrm{f}(\mathrm{x})=10(2)^{\mathrm{x}} \quad \text { 2. } \mathrm{f}(\mathrm{x})=500\left(\frac{1}{5}\right)^{\mathrm{x}-1}
$$

3. $f(x)=10(.5)^{x} \quad$ 4. $f(x)=20(3)^{x-1}$

## Given the recursive rule write the first 5 terms of the sequence

1. $a_{n}=5 \mathrm{a}_{\mathrm{n}-1} \quad \mathrm{a}_{0}=2 \quad$ 2. $a_{n}=\frac{1}{2} \mathrm{a}_{\mathrm{n}-1} \mathrm{a}_{0}=50$
2. $a_{n+1}=\frac{3}{4} \mathrm{a}_{\mathrm{n}} \quad \mathrm{a}_{1}=75 \quad$ 4. $a_{n+1}=2 \mathrm{a}_{\mathrm{n}} \quad \mathrm{a}_{1}=3$

Given the function/explicit rule write the first 5 terms of the function

$$
\text { 1. } \mathrm{f}(\mathrm{x})=4(3)^{\mathrm{x}} \quad \text { 2. } \mathrm{f}(\mathrm{x})=100\left(\frac{1}{2}\right)^{\mathrm{x}-1}
$$

$$
\text { 3. } f(x)=100(.2)^{x} \quad \text { 4. } f(x)=3(2)^{x-1}
$$

## Given the recursive rule write the first 5 terms of the sequence


3. $a_{n+1}=\frac{3}{5} \mathrm{a}_{\mathrm{n}} \quad \mathrm{a}_{1}=75 \quad$ 4. $a_{n+1}=4 \mathrm{a}_{\mathrm{n}} \quad \mathrm{a}_{1}=10$

Given the function/explicit rule write the first 5 terms of the function

$$
\text { 1. } \mathrm{f}(\mathrm{x})=1.5(2)^{\mathrm{x}} \quad \text { 2. } \mathrm{f}(\mathrm{x})=1000\left(\frac{1}{2}\right)^{\mathrm{x}-1}
$$

Given the recursive rule write the first 5 terms of the sequence

$$
\text { 1. } a_{n}=4 \mathrm{a}_{\mathrm{n}-1} \quad \mathrm{a}_{0}=2 \quad \text { 2. } a_{n+1}=\frac{2}{7} \mathrm{a}_{\mathrm{n}} \quad \mathrm{a}_{1}=2
$$

Write the function/explicit rule and the recursive rule

| $x$ | 0 | 1 | 2 | 3 | 4 |
| :--- | :--- | :--- | :--- | :--- | :--- |
| $f(x)$ | 3 | 15 | 75 | 375 | 1875 |

Write the function/explicit rule and the recursive rule

| $x$ | 0 | 1 | 2 | 3 | 4 |
| :--- | :--- | :--- | :--- | :--- | :--- |
| $f(x)$ | 2 | 6 | 18 | 54 | 62 |

