

Explicit Formula

$$0. + d(n-1)$$
 $1 = 170$
 $0. + d(n-1)$
 $0. +$

0 = 170

 $a_1 + d(n-1) = 170 - 85(n-1)$ 1 = -85 -11 + 8(n-1)19-19(n-1)

-51+17(n-1) -51+17n-17 19-19/119 -68 + 17n 38-190

Rewishe Fermula Explicit Formula C(n) = 8 - 13(n - 1) $((\Lambda) = ((\Lambda - 1) - 13)$ Recursive Formula = F(1) = A

f(n) = f(n-1) + B

$$Q_{1} = 26 \qquad 26 - 16(n-1)$$

$$Q_{2} = -16 \qquad 26 - 16n + 16$$

$$42 - 16n$$

difference

Geometric Sequences

2,6,18,54 common ratto geometric series: sum of Seguence sequence i.e. 2,6,18 2+6 +18

$$\frac{128}{32}, \frac{32}{8}, -\frac{1}{2}, \frac{2}{2}, \dots$$

$$\frac{128}{27}, \frac{32}{9}, -\frac{8}{3} = -\frac{4}{3} = -\frac{4}{3}$$

$$\frac{1}{3} = -\frac{4}{3} = -\frac{3}{4} = -\frac{3$$

 $Q(n) = Q(n-1) \cdot (-9)$

$$a(2) = a(2-1) \cdot -9$$

$$= a(1) \cdot -9$$

$$a(3) = a(n-1) \cdot (-9)$$

$$= a(3-1) \cdot -9$$

$$= a(2) \cdot -9$$

 $a(n) = \frac{3}{2} (-2)^{n-1}$

 $=\frac{3}{7}\left(-2\right)^{3-1=2}$

 $=\frac{3}{7}\left(-2\right)^2$

 $=\frac{3}{2}(4)=16$

 $\Omega(2) = -15$

$$= -15 \cdot -9$$

$$= \boxed{135}$$

$$= 135$$

$$= 135$$

$$a(1) = 20$$

$$a(n) = a(n-1)$$

$$a_1 = 20 \cdot \left(\frac{3}{2}\right)^{1-1}$$

$$a_3 = 20 \cdot \left(\frac{3}{2}\right)^{3-1=2}$$

$$=\frac{5}{3}(81)$$

 $=135$

a(1) = 20

 $= 20 \cdot \left(\frac{9}{4}\right)$

= 45

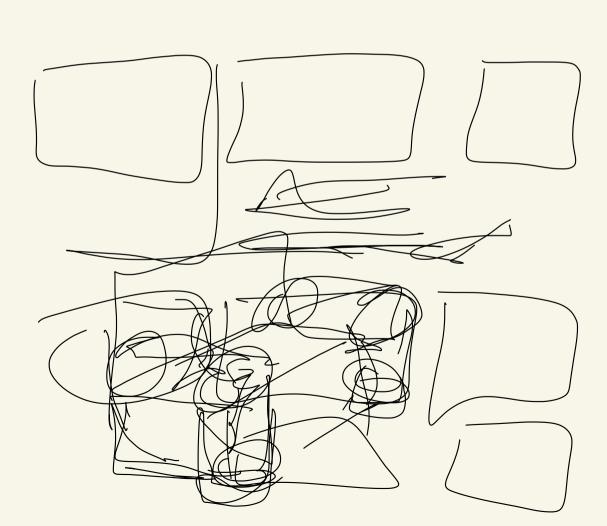
 $a_1 = \frac{5}{3} \left(\left(-q \right)^{i-1} \right)$

$$=\frac{5}{3}(81)$$
 $=1135$

 $\alpha(n) = \alpha(n-1) \cdot \frac{3}{2}$

 $=\frac{5}{5}\left(\left(-9\right)^{3-1=2}\right)$

1, 2, 4, 8 \checkmark 2×2×2 +smes 2 each so common ratho(r) = 2 r=2



$$\frac{\text{explicit formula}}{a(n) = k \cdot r^{n-1}} \qquad \frac{\text{Rewrsive formula}}{s} = \frac{s}{a(n) = k}$$

$$\frac{a(n) = k \cdot r^{n-1}}{a(n) = a(n-1) \cdot r}$$

q(3) = 4 + 3.2(3 - 1) = 4 + 6.4 = 10.4

9(4) = 4 + 3.2(4-1) = 4 + 9.6 = 13.6

$$-71 \cdot (4.2)^{n-1}$$

$$4 + 3.2(n-1)$$

$$g(1) = 4$$

$$g(2) = 4 + 3.2(2-1) = 4 + 3.2 = 7.2$$

$$\begin{cases}
g(1) = 10 \\
g(n) = g(n-1) - 7.5
\end{cases}$$

$$g(n) = g(n-1) - 7.5$$

$$g(n) = 10 - 7.5(n-1)$$

$$g(3) = 10 - 7.5(3-1)$$

$$= 10 - 7.5(2)$$

$$= 10 - 15$$

$$= [-5]$$

$$f(n) = -7 + 3.5(n-1)$$

$$f(3) = -7 + 3.5(3-1)$$

$$-7 + 10.5 - 3.5$$

$$f(n) = 3 - 14(n-1)$$

d(3) = 3 - |4(3 - 1)|

3 - 28

-7+10.5-3.5

-7+7

 $-9.(3)^{n-1}$ $4.(-0.5)^{n-1}$