

5.4 Determinant

$$A = \begin{bmatrix} a & b \\ c & d \end{bmatrix}$$

Inverse

$$A^{-1} = \frac{1}{ad-bc} \begin{bmatrix} d & -b \\ c & a \end{bmatrix}$$

$$\det A = ad - bc$$

$$\begin{bmatrix} -3 & 4 \\ -2 & 1 \end{bmatrix}$$

$$-3(1) - (-2)(4)$$

$$-3 + 8$$

$$5$$

Sequence

first five
numbers

$$a_n = 2n + 1$$

$$a_1 = 2(1) + 1 = 3$$

$$a_2 = 2(2) + 1 = 5$$

$$a_3 = 2(3) + 1 = 7$$

$$a_4 = 2(4) + 1 = 9$$

$$a_5 = 2(5) + 1 = 11$$

$$a_{20} = 2(20) + 1 = 41$$

$$\sum_{i=1}^4 (6i + 3)$$

$$i=1 \quad 6(1) + 3 = 9$$

$$i=2 \quad 6(2) + 3 = 15$$

$$i=3 \quad 6(3) + 3 = 21$$

$$i=4 \quad 6(4) + 3 = 27$$

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