

(1)

$$\frac{a_{n+1}}{a_{n+2}} = f \Rightarrow a_{n+1} = f a_{n+2} \Rightarrow a_{n+1} = V$$

$$a_{n+1}^2 - a_{n+1} - a_n^2 = a_{n+1} \Rightarrow a_{n+1}^2 - a_n^2 = f$$

$$(a_{n+1} - f)(a_{n+1}) = 0 \Rightarrow a_{n+1} = f$$

(2)

مباينة

$$a_{n+1}^2 - f a_{n+1} - f a_{n+1}^2 + f^2 a_{n+1} = 0 \Rightarrow a_{n+1}^2 - f a_{n+1} - f a_{n+1}^2 + f^2 a_{n+1} = 0$$

$$f a_{n+1} - 145 - 14 + 5 a_{n+1}^2 + f^2 a_{n+1}^2 = 0 \Rightarrow 5 a_{n+1}^2 - 145 + 13 a_{n+1} = 0$$

$$5 \leftarrow \frac{V}{a}$$

$$a_{n+1}^2 - 5 a_{n+1} - a_{n+1}^2 + 5 a_{n+1}^2 = 0 \Rightarrow a_{n+1}^2 - 5 a_{n+1} - a_{n+1}^2 + 5 a_{n+1}^2 = 0$$

$$9 - 15 - 1 + 15 a_{n+1}^2 = 0 \Rightarrow 1 - 5 a_{n+1}^2 = 0 \Rightarrow 5 a_{n+1}^2 = 1$$

Year: Month: Day:

$$(2)_{10} = 00010100$$

$$(41)_{10} = 00101001$$

$$(22)_{10} = 00110100$$

$$(12)_{10} = 00001100$$

$$((2)_{10} + (41)_{10})_2 = (0011101)_2 \Rightarrow (1100010)_2$$

$$N(22)_{10} = 11000010 \Rightarrow (00110100)_2 \Rightarrow (00000000)_2 \Rightarrow (00000000)_2$$

$$\begin{matrix} 0 & 0 & 0 & 0 & 0 & 0 & 0 & 0 \\ 1 & 1 & 1 & 1 & 0 & 0 & 1 & 1 \end{matrix} = (11110011)_2 \Rightarrow (00001100)_2 =$$

(2)