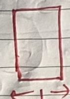
$f(n)$ = total ways

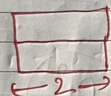
9.00

ways end with

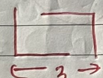
10.00

11.00 $f(n-1)$  (end with _v)

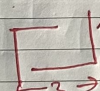
12.00

1.00 $f(n-2)$  (end with _hh)

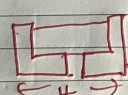
2.00

3.00 $f(n-3) + f(n-5) +$  → can be of size 3, 5, 7, 9 ...... (end with _L_x dominoes_7)

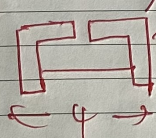
4.00 $f(n-7) + \dots\dots$ — Same ways for both → *2

5.00 $f(n-3) + f(n-5) +$  → can be of size 3, 5, 7, 9 ... (end with _F_x dominoes_rev L)

6.00 $f(n-7) + \dots\dots$

$f(n-4) + f(n-6) +$  → can be of size 4, 6, 8, 10 ... (end with _L_x dominoes_rev L)

$f(n-8) + \dots\dots$ — Same ways for both → *2

$f(n-4) + f(n-6) +$  → can be of size 4, 6, 8, 10 ... (end with _F_x dominoes_rev F)

$f(n-8) + \dots\dots$

S	M	T	W	T	F	S
31					1	2
3	4	5	6	7	8	9
10	11	12	13	14	15	16
17	18	19	20	21	22	23
24	25	26	27	28	29	30

MAR '24

Go to next page

$$f(n) = f(n-1) + f(n-2) + 2f(n-3) + 2f(n-4) + \dots\dots 2f(0)$$

9.00

10.00

11.00

12.00 (talking about 0 or more than 0 horz-dominoes in btw)

1.00

2.00

3.00

4.00

5.00

6.00

M	T	W	T	F	S	S
		1	2	3	4	5
6	7	8	9	10	11	12
13	14	15	16	17	18	19
20	21	22	23	24	25	26
27	28	29	30	31		

MAY '24

From Previous Page we got :-

25 April 2024
Thursday
Day 116 • 250

$f(n) = f(n-1) + f(n-2) + 2f(n-3) + 2f(n-4) + 2f(n-5) + \cdots + 2f(0)$

$f(n-1) = f(n-2) + f(n-3) + 2f(n-4) + 2f(n-5) + 2f(n-6) + \cdots + 2f(0)$

$\Rightarrow f(n) - f(n-1) = f(n-1) + f(n-3)$

$\Rightarrow \boxed{f(n) = 2 * f(n-1) + f(n-3)}$ ★★★

Donot cram it !!!