



積木用途：將指定檔案內容載入記憶體(如果沒有檔案會建立一個新檔)，並將資料寫入配置給該檔案的記憶體中。

說明：此積木只在記憶體中運作，程式運算結束必須使用底下的儲存檔案積木將結果存入檔案中。



積木用途：設定儲存格的背景色。

說明：此積木只在記憶體中運作，程式運算結束必須使用底下的儲存檔案積木將結果存入檔案中。



積木用途：將程式運算結果存入檔案中。

說明：程式運作時，只將資料存放在配置給檔案的記憶體中，必須執行這個積木才會將記憶體中的資料存入檔案中，若程式運作中途有打開檔案觀察內容，觀察後記得關閉 Excel，否則會影響檔案儲存。

程式範例： 將偵測到的空氣懸浮粒子指數存入檔案 d:\file1.xlsx 中。

This Scratch script is designed to write air quality data to an Excel file. It begins with a 'When clicked' event, followed by a 'Write header names' block. Two variables, 'filename' and 'row', are initialized to 'd:\file1' and '2' respectively. A 'Repeat loop' block is then used to execute the following sequence of actions:

- Read 'PM2.5 (μg/m³)' data using a sensor module 'PMS5003G5' with standard 'Rx 10' and 'Tx 11' pins.
- Read 'PM10 (μg/m³)' data using the same sensor module.
- Write the current month to row 1, column 1.
- Write the current day to row 2, column 1.
- Write the current time to row 3, column 1.
- Write the current minute to row 4, column 1.
- Write the 'pm2.5' value to row 'row', column 5.
- Judge the 'pm2.5' color grade and set the 'color' variable to row 'row', column 5.
- Insert the 'pm2.5' value into the 'pm2.5即時監測' chart.
- Write the 'pm10' value to row 'row', column 6.
- Judge the 'pm10' color grade and set the 'color' variable to row 'row', column 6.
- Increase the 'row' variable by 1.
- Save the 'filename' variable.
- Wait for 600 seconds.

This Scratch script defines the header names for the Excel file. It starts with a 'Define' block for 'Write header names', followed by a series of 'Write to file' blocks that specify the column and row for each header:

- Write '月' (Month) to row 1, column 1.
- Write '日' (Day) to row 1, column 2.
- Write '時' (Time) to row 1, column 3.
- Write '分' (Minute) to row 1, column 4.
- Write 'PM2.5' to row 1, column 5.
- Write 'PM10' to row 1, column 6.



	A	B	C	D	E	F
1	月	日	時	分	PM2.5	PM10
2	8	20	1	34	12	12
3	8	20	1	44	12	14
4	8	20	1	54	9	9
5	8	20	2	4	10	11
6	8	20	2	14	8	10
7	8	20	2	24	10	14
8	8	20	2	34	8	10
9	8	20	2	44	9	9
10	8	20	2	54	9	9
11	8	20	3	4	8	9
12	8	20	3	14	8	8
13	8	20	3	24	10	10
14	8	20	3	34	8	8
15	8	20	3	44	8	10
16	8	20	3	54	10	10
17	8	20	4	4	9	9
18	8	20	4	14	8	8
19	8	20	4	24	8	8
20	8	20	4	34	10	11
21	8	20	4	44	7	9
22	8	20	4	54	11	11
23	8	20	5	4	10	10
24	8	20	5	14	9	9
25	8	20	5	24	10	14
26	8	20	5	34	10	14
27	8	20	5	44	10	10
28	8	20	5	54	9	9
29	8	20	6	5	9	10
30	8	20	6	15	9	9
31	8	20	6	25	8	9
32	8	20	6	35	7	7

程式執行後 d:\file1.xlsx 檔案部分內容