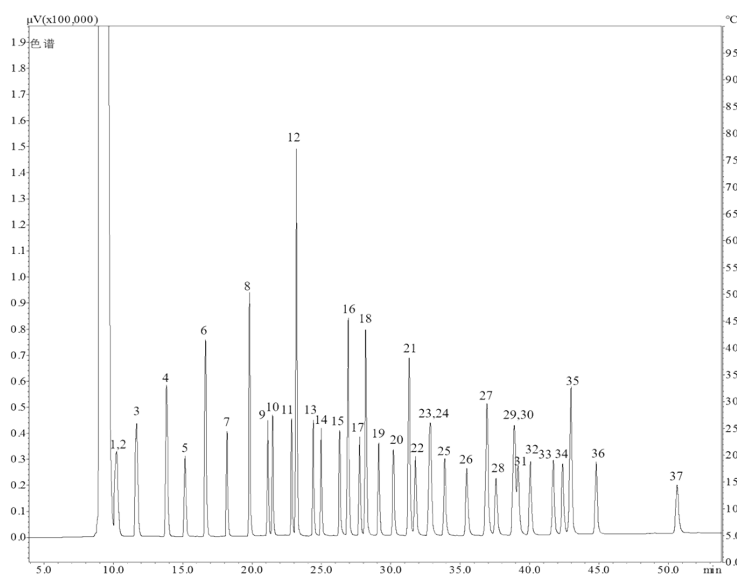


The spectrum of external standard and sample and the details of the 37 fatty acid methyl ester are as follow:

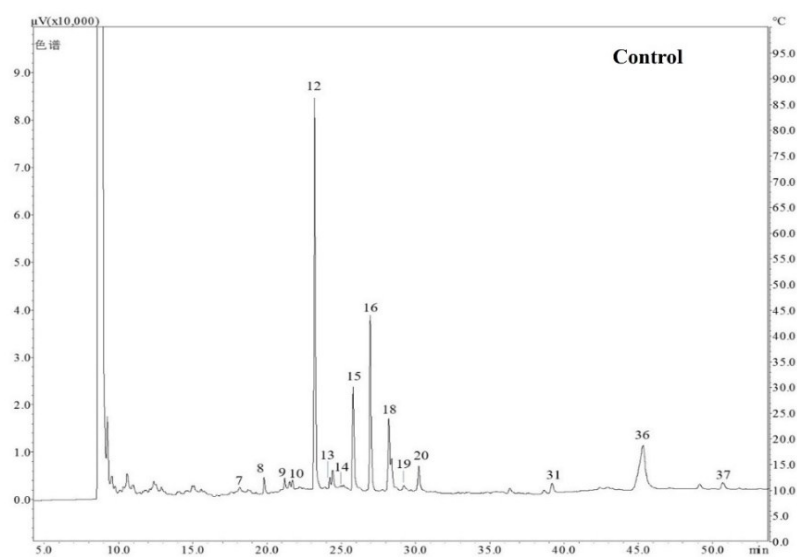


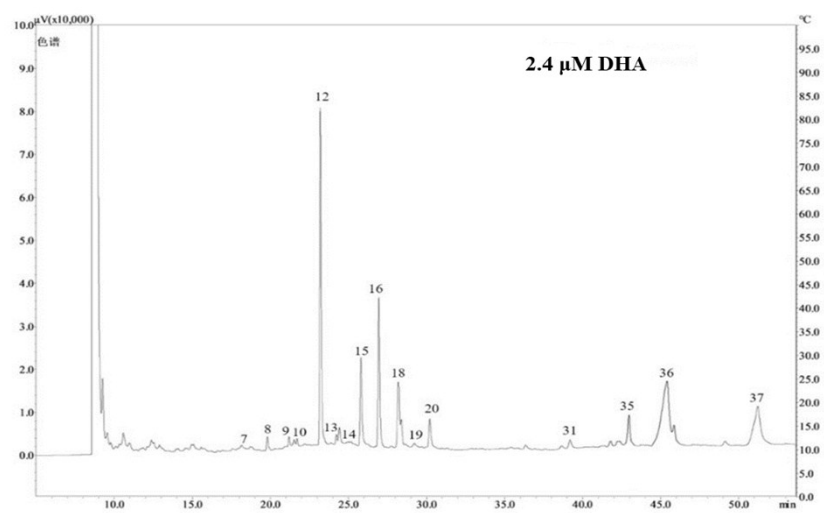
Supplementary Fig. 1 GC analysis of the 37-component FAME mix

Supplementary Table 1 37 kinds of fatty acids standard

Peak No.	Fatty acids	Name
1	C4: 0	Methyl butyrate
2	C6: 0	Methyl caproate
3	C8: 0	Methyl caprylate
4	C10: 0	Methyl caprate
5	C11: 0	Methyl undecanoate
6	C12: 0	Methyl laurate
7	C13: 0	Methyl tridecanoate
8	C14: 0	Methyl myristate
9	C14: 1 (<i>n</i> -9)	Methyl 9-cis-tetradecenoate
10	C15: 0	Methyl pentadecanoate
11	C15: 1 (<i>n</i> -9)	Methyl cis-10-decarbonate
12	C16: 0	Methyl palmitate
13	C16: 1 (<i>n</i> -7)	Methyl palmitoleate
14	C17: 0	Methyl heptadecanoate
15	C17: 1 (<i>n</i> -9)	Methyl cis-10-heptachenoate
16	C18: 0	Methyl stearate
17	C18: 1 (<i>n</i> -9t)	Methyl trans oleate
18	C18: 1 (<i>n</i> -9c)	Methyl oleate
19	C18: 2 (<i>n</i> -6t)	Methyl antilinoate
20	C18: 2 (<i>n</i> -6c)	Methyl linoleate
21	C20: 0	Methyl arachidate
22	C18: 3 (<i>n</i> -6)	Methyl γ linolenate
23	C20: 1 (<i>n</i> -9)	Methyl cis-11-eicosenoate

24	C18: 3 (<i>n</i> -3)	Methyl α linolenate
25	C21: 0	Methyl hexanilate
26	C20: 2 (<i>n</i> -6)	Cis-11, 14-methyl eicosarbonate
27	C22: 0	Methyl elm acid
28	C20: 3 (<i>n</i> -6)	Cis 8,11,14- methyl eicosapentaenoic acid
29	C22: 1 (<i>n</i> -9)	Methyl cis-erucate
30	C20: 3 (<i>n</i> -3)	Cis-11,14,17-eicosapentaenoic acid methyl ester
31	C20: 4 (<i>n</i> -6)	Methyl arachidonic acid
32	C23: 0	Methyl docanoate
33	C22: 2 (<i>n</i> -6)	Cis -13,16- methyl docosarcoxylenate
34	C24: 0	Methyl xylenate
35	C20: 5 (<i>n</i> -3)	Cis-5,8,11,14,17-eicosapentaenoic acid methyl ester
36	C24: 1 (<i>n</i> -9)	Methyl neurite
37	C22: 6 (<i>n</i> -3)	Cis-4,7,10,13,16, 19-docosahexaenoate





Supplementary Fig. 2 GC analysis of RAW264.7 cell membrane fatty acid