

WF_ABBA final output fire mask codes v6.5.012g		
Mask Codes	AWIPS Code	Definition
0	10	Non-processed region of input/output image
10	1	Processed fire pixel
11	2	Saturated fire pixel
12	3	Cloud contaminated fire pixel
13	4	High probability fire pixel
14	5	Medium probability fire pixel
15	6	Low probability fire pixel
20	1	Processed fire pixel removed by sampling screen
21	2	Saturated fire pixel removed by sampling screen
22	3	Cloud contaminated fire pixel removed by sampling screen
23	4	High probability fire pixel removed by sampling screen
24	5	Medium probability fire pixel removed by sampling screen
25	6	Low probability fire pixel removed by sampling screen
30	11	Temporally Filtered Processed fire pixel
31	12	Temporally Filtered Saturated fire pixel
32	13	Temporally Filtered Cloud contaminated fire pixel
33	14	Temporally Filtered High probability fire pixel
34	15	Temporally Filtered Medium probability fire pixel
35	16	Temporally Filtered Low probability fire pixel
40	10	Space pixel
50	10	Satellite zenith angle block-out zone, greater than threshold of 80°
60	10	Reflectance (glint) angle or solar zenith angle block-out zone, within respective thresholds, 10° and 10° respectively
100	7	Processed region of image
120	10	Bad input data: missing data, 4 μm
121	10	Bad input data: missing data, 11 μm
123	2	Bad input data: saturation, 4 μm
124	10	Bad input data: saturation, 11 μm
125	10	Invalid reflectivity product input (value <0). Can be indicative of localized spikes in the reflectivity product/bad data
126	10	Unusable input data: 4 μm less than minimum threshold (200 K)
127	10	Unusable input data: 11 μm less than minimum threshold (200 K)
130	10	Reserved
150	10	Invalid ecosystem type
151	8	Sea water
152	8	Coastline Fringe
153	8	Inland Water and other Land/water mix
155	10	Reserved
160	10	Invalid emissivity value
170	10	No background value could be computed
180	10	Error in converting between temperature and radiance
182	10	Error in converting adjusted temperatures to radiance
185	10	Values used for bisection technique to hone in on solutions for Dozier technique are invalid.
186	10	Invalid radiances computed for Newton's method for solving Dozier equations
187	10	Errors in Newton's method processing
188	10	Error in computing pixel area for Dozier technique
200	9	11 μm threshold cloud test
201	9	Band 7 minus 14 difference below threshold and below freezing test
205	9	4 μm minus 11 μm negative difference threshold cloud test

210	9	4 μm minus 11 μm positive difference threshold cloud test
215	9	Albedo threshold cloud test (daytime only)
220	9	12 μm threshold cloud test (only used when data available)
225	9	11 μm minus 12 μm negative difference threshold cloud test
230	9	11 μm minus 12 μm positive difference threshold cloud test
240	9	Along scan reflectivity product test to identify and screen for cloud edge used in conjunction with 4 μm threshold
245	9	Along scan reflectivity product test to identify and screen for cloud edge used in conjunction with albedo threshold

Notes:

- 4 μm refers to the equivalent channel on the satellite, as do 11 μm and 12 μm . For GOES-R ABI those channels are: 3.9 μm (Channel 7), 11.2 μm (Channel 14), and 12.3 μm (Channel 15).
- The sampling screen currently applies only to GOES-8 through GOES-15.

WF_ABBA intermediate fire mask codes v6.5.011g (not included in final output)	
Mask Codes	Definition
101	Non-fire, clear-sky pixel; 4 μm temperature minus 11 μm temperature less than fire threshold, greater than cloud threshold; set to 100 for final product
102	Non-fire, clear-sky pixel; 4 μm temperature less than fire threshold and greater than 150 K and 4 μm temperature minus 11 μm temperature less than cloud threshold; set to 100 for final product
103	Non-fire, clear-sky pixel; 4 μm temperature minus 11 μm temperature less than cloud threshold; set to 100 for final product
104	Non-fire, clear-sky pixel; 4 μm temperature minus 11 μm temperature less than standard deviation of that value in background window and it took more than 10 iterations to calculate the background value or the pixel is saturated; set to 100 for final product
105	Non-fire, clear-sky pixel; 4 μm temperature minus 4 μm background temperature less than standard deviation of that value in background window and it took more than 10 iterations to calculate the background value or the pixel is saturated; set to 100 for final product
106	Non-fire, clear-sky pixel; 4 μm radiance minus 11 μm radiance less than standard deviation of that value in background window; set to 100 for final product
107	Non-fire, clear-sky pixel; 4 μm temperature minus 11 μm temperature less than zero or 4 μm temperature minus 4 μm background temperature less than zero; set to 100 for final product
108	Non-fire, clear-sky pixel; 4 μm temperature minus 11 μm temperature less than standard deviation of that value in background window and 4 μm radiance minus 11 μm radiance less than standard deviation of that value or fails scanline check; set to 100 for final product
109	Non-fire, clear-sky pixel; 4 μm temperature minus 4 μm background temperature less than standard deviation of that value in background window and 4 μm radiance minus 11 μm radiance less than standard deviation of that value or fails scanline check; set to 100 for final product
110	Non-fire, clear-sky pixel; pixels which do have valid background temps, but may be eliminated as a fire due to cloud contamination; set to 100 for final product
111	Number of fires in scan has exceeded threshold (50000); set to 100 for final product