

WARNING/ADVISORY CRITERIA

Definitions: *Watch* – Conditions are favorable for weather hazard to occur. Prepare for warnings to be issued.

Warning – Event is imminent, occurring close by, or, in the case of a winter storm/hurricane, has a high likelihood of occurrence. Take action to protect life and property.

Marine Wind/Wave Criteria

Headline	Chesapeake Bay	Currituck Sound & Virginia Rivers	Maryland/Virginia/NC Coastal Waters
Small Craft Advisory (use top of wind and seas range)	18-33 Kt/4+ Ft	18-33 Kt/None	25-33 Kt/5+ Ft
Gale Warning	34-47 Kt		
Storm Warning	≥48 Kt		
Special Marine Warning (SMW)	Thunderstorm winds ≥34 Kt; hail ≥¾" and/or waterspouts		
High Surf Advisory	N/A	N/A	Surf 8 Ft Near Shore 10 Ft/10 second period 12 Ft/10 second period **

(** = Duration >12 hrs)

Public Products Warning/Advisory Thresholds

Warning/Advisory (Product ID)	Snow	Freezing Rain	Combination of winter hazards
Winter Storm Warning * (WSW) MD/Interior VA NC/SE VA	Average of forecast. range: 5"/24 hr or 4"/12 hr 4"/24 hr or 3"/12 hr Sleet – 1"+ (all areas)	At least 1/4" of ice accretion (all areas)	Hazards judged to pose a threat to life and property
Winter Weather Advisory * (WSW)	Avg. of fcst range at least: 1-2" VA/MD/NC Sleet - .25" to 1"	Any accretion on sidewalks roadways	Hazards cause a significant inconvenience, and warrant extra caution
Blizzard Warning (WSW)	Sustained wind or frequent gusts ≥35 mph AND considerable blowing/drift of snow/falling snow reducing visibilities frequently < 1/4 mile for > 3 hours		
Wind Chill Advisory (WSW)	Wind Chill Index ≤ 0° F		
Wind Chill Warning (WSW)	Wind Chill Index ≤ -15° F		
Frost Advisory (NPW)	Issued at the end (fall) or beginning (spring) of the growing season when frost is expected, but severity not sufficient to warrant a freeze warning. Under prime radiational cooling conditions, issue when low temps are forecast to be in the 33 to 36 degree range.		
Freeze Warning (NPW)	Issued in conjunction with temperatures forecast 32° F or below for any length of time; the lower end of the forecast range is used (i.e. 32 to 37 deg would warrant a freeze warning)		
Dense Fog Advisory (NPW)	Issued for widespread or localized fog reducing visibilities to 1/4 mile or less		
Heat Advisory (NPW)	Maximum Heat Index > 105° F for at least 3 hours (HI=Heat Index)		
Excessive Heat Warning (NPW)	Maximum Heat Index > 110° F for at least 3 hours (HI=Heat Index)		
Wind Advisory (NPW)	31-39 mph (27-34 kt) sustained 1 hour or more		
High Wind Warning (NPW)	≥ 40 mph (35 kt) sustained 1 hour or ≥ 58 mph (50 kt) for any duration		
Severe T'Storm Warning (SVR)	1" diameter hail (size of quarter) or larger; and/or winds ≥ 58 mph (50 kt); and/or damage to trees, power lines, and/or structures.		
Tornado Warning (TOR)	Tornado detected by radar and/or funnel cloud or tornado spotted. Waterspout moving onshore.		

* Use average or midpoint value of range; ROUND UP! so. 3-5" meets warning criteria, 1-2" meets advisory criteria

Aviation Low Level Wind Shear Criteria

LLWS	PIREPs received of wind shear with >± 20 Kt of airspeed within 2000 Ft AGL Vertical shears ≥10 Kt per 100 Ft layer > 200 Ft thick within 2000 Ft AGL
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Fire Weather Criteria

Fire Weather Watch (RFW) (12-73 hours in advance) or Red Flag Warning (RFW) (< 24 hours in advance)	VA: Fuel Moisture ≤7% AND Wind ≥20 mph with RH < 30 % MD: Fuel Moisture ≤8% AND Wind ≥20 mph with RH < 30% NC: Fuel Moisture ≤10% AND Wind ≥20 mph and/or G30+ mph with RH ≤25%
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