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ALASKA COASTAL MARINE FORECAST SERVICES

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SUMMARY OF REVISIONS: This supplement supersedes Alaska Region Supplement 04-2002, Alaska Coastal Marine Forecast Services, dated January 13, 2004, filed with NWSI 10-310.

The following changes were made in this issuance:

1. Forecast parameters for the Coastal Waters Forecast were updated to allow the use of descriptive terms such as CHOPPY and ROUGH to describe the sea state in Weather Forecast Office (WFO) specified marine areas such as bays, inlets, and harbors.

2. Coded Marine Forecast sample was updated to show the correct zone number in Southeast Alaska.

3. Requirement for combining periods with similar weather was removed. This is recommended by national policy but not currently required.

4. Forecast examples were updated.

The section numbers in this supplement refer to the section numbers in NWSI 10-310.

Signed Laura K. Furgione Regional Director <u>2/4/05</u> Date

Alaska Coastal Marine Forecast Services

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1. <u>Purpose</u>. The coastal marine forecast service procedures in the Alaska Region are described to augment the procedures in NWSI 10-310.

2. <u>Coastal Waters Forecasts (CWF)</u>.

2.2 <u>Issuance Guidelines</u>. WFOs provide CWFs to explicitly state expected weather conditions within their marine forecast areas of responsibility through five days. Some Weather Service Offices (WSO) provide a CWF for selected bays and passages in their local areas to support and promote safe commercial and recreational use in high traffic areas. This is done by adapting the CWF generated by the WFO for the adjacent marine area to account for the effects of the local topography and bathymetry.

2.3 <u>Technical Description</u>.

2.3.3 <u>Content</u>. As shown in the examples in the Appendix, wind forecasts are given first, followed by the sea state forecast, and then significant weather in each period. In addition, the following guidelines should be observed:

- 1. Ranges for wind speed and wave height are not permitted. Single values representing predominant conditions are used.
- 2. If wind gusts are forecast, only one gust value may be included in each period.
- 3. Visibility is only included for forecast conditions of 1 nautical mile (nm) or less.
- 4. Forecasts should highlight meaningful trends and significant changes to ensure HF and VHF broadcasts of these products are concise and understandable. Thus, forecast changes within periods should be kept to a minimum. (Guidelines are provided in Table 1.)

Marine Weather Parameter	Expression in Forecast
Winds < 24 kt	No deterministic changes mentioned, unless increasing to gale. If increasing to gale, only include trend to highest value (e.g., INCREASING TO 40 KT). Note: For all wind speeds, if change is less than threshold specified above, use a trend to or from the highest value (e.g., SOUTH WINDS 15 KT DECREASING).
Winds 24-50 kt	Include speed changes of 10 kt or more, unless increasing to gale or storm category. In that case, only include trend to highest value (e.g., INCREASING TO 40 KT).
Winds \geq 50 kt	Include wind speed changes of 20 kt or more (e.g., EAST WINDS 50 KT INCREASING TO 70 KT).
Wind direction	Include changes of 90 degrees or more.
Waves ≥ 6 ft	Include changes of 25% or greater.
Waves < 6 ft	Include trend from highest value (subsiding or building).
Weather	If probability is 65% or greater, a categorical forecast of precipitation is mentioned (e.g., RAIN, SNOW). No expressions of probability are included (e.g., LIKELY, CHANCE OF). Only one change or trend allowed per period (e.g., RAIN ENDING).
Visibility	Only one trend allowed per period (improving from or deteriorating to lowest condition).

 Table 1 – Guidelines for composition of the Coastal Waters Forecast

Exception: For waters with a large recreational marine community, such as the Inside Passage or Prince William Sound, or near large subsistence marine communities, like much of Northern Alaska, changes more minor than those outlined in Table 1 may be included based upon expressed customer needs and in accordance with all relevant dissemination restrictions.

2.3.8 <u>CWF – Forecast Parameters</u>.

b. <u>Seas</u>. NWSI 10-310 allows for the use of descriptive words such as CHOPPY or ROUGH to characterize the sea state in regionally specified bays, inlets, harbors, estuaries, etc. In the Alaska Region, these descriptive words may be used in the marine forecasts for waters with a large number of recreational users, such as the Prince William Sound area. These areas are to be specified by the WFOs in coordination with local customers and partners.

2.4 <u>Format</u>. The CWF product issued by the WFOs and WSOs will follow the format prescribed in NWSI 10-310. To aid in dissemination, WFOs should use standard abbreviations in the text of the CWF (i.e., NW instead of NORTHWEST).

Exception: Similar to the Nearshore Marine Forecast issued in the Great Lakes, the CWFs issued by the WSOs will not contain a synopsis. See the format in Figure 1.

(WMO ID) (ISSUANCE DATE TIME) (AWIPS ID) MARINE FORECAST FOR (AREA DESCRIPTION) NATIONAL WEATHER SERVICE (CITY) (STATE) (VALID TIME) AM/PM (LOCAL TIME ZONE)(DAY)(DATE) (AREAL UGC CODE[S])-(EXPIRATION TIME)-(FORECAST AREAL DESCRIPTOR[S]) (VALID TIME) AM/PM (LOCAL TIME ZONE) (DAY) (DATE) ... HEADLINE (If needed)... .PERIOD 1... .PERIOD 2... .PERIOD 3... .PERIOD 4... .PERIOD 5... .PERIOD 6 (Optional period for the morning issuance)... .PERIOD 7 (Optional period for the afternoon issuance)... .(DAY 4)... .(DAY5)... \$\$ FORECASTER NAME (Optional)

Figure 1 – Coastal Waters Format for WSOs

4. <u>Coded Marine Forecast</u>.

4.1 <u>Mission Connection</u>. The Coded Marine Forecast (CMF) is designed to provide ships at sea with marine forecast information via Marine Radio Facsimile broadcasts. Due to large gaps in NOAA Weather Radio coverage along Alaska's coast, this is a way to provide mariners with routine access to marine forecast and warning information. This product is intended to provide information to assist in the protection of life and property and enhance the nation's economy.

4.2 <u>Issuance Guidelines</u>

4.2.1 <u>Creation Software</u>. The CMF is generated on an automated schedule using software requiring no post editing.

4.2.2 <u>Issuance Criteria</u>. The CMF is generated twice daily coincident with the timing of the issuance of the Coastal Waters Forecasts and Offshore Marine Forecasts by the WFOs.

4.2.3 <u>Issuance Time</u>. The CMF is disseminated via Marine Radio Facsimile on a schedule established by the U.S. Coast Guard. The Kodiak Marine Radio Fax broadcast schedule is available at <u>http://weather.noaa.gov/fax/alaska.shtml</u>.

4.2.4 <u>Valid Time</u>. The CMF is valid from the time of issuance until the expiration time.

4.2.5 <u>Product Expiration Time</u>. The CMF expiration time is no more than 12 hours from the product issuance.

4.3 <u>Technical Description</u>. The CMF will follow the format and content described in this section.

4.3.1 Mass News Dissemination (MND) Broadcast Line. None.

4.3.2 <u>MND Heading</u>. National Weather Service Marine Forecast for Alaska.

4.3.3 <u>Content</u>. The CMF is an alphanumeric product in a table format that provides abbreviated versions of the CWFs and Offshore Marine Forecasts (OFF). The table contains forecast information for the following marine weather parameters: wind, waves, icing, and significant weather.

The CMF contains a summary of the forecasts issued in the offshore and selected coastal waters products in the form of a 12- and 24-hour snapshot for each given marine area. In other words, the forecast represents the conditions expected to occur at the valid time (00Z or 12Z), not an average forecast for the 12-hour period. The tabular summary consists of the following items:

Warning – Include the warning type expected to be in effect at the valid time. Do not include volcanic ash. For Hurricane Force use "HURC," for Storm use "STM," for Gale use "GALE," for Small Craft Advisory use "SMCR," for Brisk Wind Advisory use "BRSK." If no warnings are expected, enter "NONE."

Wind – Predominant direction to 8 point compass; wind speed in knots. Use "V" for variable direction.

Seas - Significant wave height in feet; use only one value.

Weather – Predominant weather condition, using the weather types and contractions listed in Table 1. The main obstruction to visibility should be used if there is more than one weather type (i.e., fog instead of rain). Authorized terms and their abbreviations are listed in 4.3.3.1 below. If no significant weather is expected, leave at least one blank space between the delimiters.

Icing – When icing is expected, use "ICING" or "HEAVY," corresponding to the marine forecast. If no icing is expected, use "NONE."

4.3.3.1 <u>Weather/Visibility</u>. Table 2 lists the weather terms and abbreviations that may be used in the CMF.

Weather Term	Abbreviation
Rain	RAIN
Snow	SNOW
Rain and Snow	RASN
Freezing Rain	FZRA
Showers	SHWRS
Thunderstorms	TSTM
Fog	FOG
Squall	SQLL
Blowing Snow Over Ice-Covered Areas	BLSN

Table 2 – Weather terms and abbreviations to be used in the CMF

4.4 <u>Format</u>. The CMF will follow the format specified in Figure 2.

			NATIO	NAL WEATHER	SERVICE	MARINE F	ORECAST	FOR AL	ASKA		
FORECAST FOR HHMM UTC MON DD YYYY			FORECAST FOR HHMM UTC MON DD YYYY								
ZONE	WIND (KT)	SEA (FT)	WX	WARNINGS	ICING	ZONE	WIND (KT)	SEA (FT)	WX	WARNINGS	ICING
013	S35	7	RAIN	GALE	NONE	013	N25	5		SMCR	ICING
ISSUED HHMM UTC MON DD YYYY			NEXT SCHEDULED FORECAST HHMM UTC MON DD YYYY								
12 AND 24 HOUR MARINE FORECAST TABLES											

Figure 2 – Format for the Coded Marine Forecast with a sample entry included

4.5 <u>Updates, Amendments and Corrections</u>. The CMF is not updated, amended, or corrected. It is generated automatically at a designated time prior to the Kodiak Marine Facsimile broadcast based on information extracted from OFFs and selected CWFs at that time.

APPENDIX A - Examples of Coastal NWS Alaska Forecasts

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		Example of a WSO Coastal Waters Forecast	

1. <u>Coastal Waters Forecast</u>.

1.1 Example of a WFO Juneau Coastal Waters Forecast.

FZAK51 PAJK 282330 CWFAJK

SOUTHEAST ALASKA COASTAL WATERS FORECAST NATIONAL WEATHER SERVICE JUNEAU ALASKA 400 PM AST TUE DEC 28 2004

SOUTHEAST ALASKA INSIDE WATERS FROM DIXON ENTRANCE TO SKAGWAY

WIND FORECASTS REFLECT THE PREDOMINANT SPEED AND DIRECTION EXPECTED. SEA FORECASTS REPRESENT THE AVERAGE OF THE HIGHEST ONE-THIRD OF THE COMBINED WINDWAVE AND SWELL HEIGHT.

PKZ098-291500-

.SYNOPSIS FOR SOUTHEAST ALASKA INNER CHANNELS COASTAL WATERS... A 985 MB LOW WILL MOVE SOUTHWARD FROM 100 NM WEST OF CAPE EDGECUMBE TO 160 NM WEST OF THE CHARLOTTES BY WED MORNING. HIGH PRESSURE THEN DEVELOPS OVER THE PANHANDLE BEHIND A STRONG ARCTIC FRONT INTO THE WEEKEND. GALE TO STORM FORCE NORTH TO NORTHEAST WINDS ARE EXPECTED WED INTO FRI IN MANY OF OUR INNER CHANNELS. HEAVY FREEZING SPRAY IS EXPECTED IN OUR CHANNELS FAVORED BY STRONG OFFSHORE FLOW...ESPECIALLY NEAR THE ENTRANCE REGIONS OF INLETS AND BAYS. FREEZING SPRAY IS LIKELY ELSEWHERE.

\$\$ PKZ011-291500-GLACIER BAY-400 PM AST TUE DEC 28 2004

...STORM WARNING LATE TONIGHT AND WED... ...HEAVY FREEZING SPRAY WARNING THROUGH WED...

.TONIGHT...N WINDS INCREASING TO N 50 KT LATE. SEAS 10 FT. HEAVY FREEZING SPRAY. .WED...NE WINDS 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .WED NIGHT...E STORM FORCE WINDS TO 55 KT. SEAS 8 FT. HEAVY FREEZING SPRAY. .THU...N STORM FORCE WINDS TO 55 KT. SEAS 10 FT. HEAVY FREEZING

SPRAY. .THU NIGHT THROUGH FRI...N STORM FORCE WINDS TO 50 KT. SEAS 10 FT. FREEZING SPRAY. .SAT THROUGH SUN...E WINDS 30 KT. SEAS 6 FT. \$\$ PKZ012-291500-LYNN CANAL NORTH OF BERNERS BAY-400 PM AST TUE DEC 28 2004 ... GALE WARNING THROUGH WED... ... HEAVY FREEZING SPRAY WARNING THROUGH WED... .TONIGHT...N WINDS 40 KT. SEAS 8 FT. HEAVY FREEZING SPRAY. .WED...N WINDS INCREASING TO 45 KT IN THE AFTERNOON. SEAS 9 FT. HEAVY FREEZING SPRAY. .WED NIGHT...N GALES TO 45 KT. SEAS 9 FT. HEAVY FREEZING SPRAY. .THU...N STORM FORCE WINDS TO 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .THU NIGHT...N STORM FORCE WINDS TO 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .FRI...N GALES TO 45 KT. SEAS 9 FT. HEAVY FREEZING SPRAY. .SAT...N GALES TO 35 KT. SEAS 7 FT. .SUN...N WINDS 30 KT. SEAS 6 FT. \$\$ PKZ013-291500-LYNN CANAL SOUTH OF BERNERS BAY-400 PM AST TUE DEC 28 2004 ... GALE WARNING THROUGH WED... ... HEAVY FREEZING SPRAY WARNING THROUGH WED... .TONIGHT...N WINDS 35 KT. SEAS 7 FT. HEAVY FREEZING SPRAY. .WED...N WINDS 40 KT. SEAS 8 FT. HEAVY FREEZING SPRAY. .WED NIGHT...N GALES TO 45 KT. SEAS 9 FT. HEAVY FREEZING SPRAY. .THU...N STORM FORCE WINDS TO 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .THU NIGHT...N STORM FORCE WINDS TO 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .FRI...N GALES TO 35 KT. SEAS 7 FT. HEAVY FREEZING SPRAY. .SAT...N GALES TO 35 KT. SEAS 7 FT. .SUN...N WINDS 25 KT. SEAS 5 FT. \$\$ PKZ021-291500-ICY STRAIT-400 PM AST TUE DEC 28 2004 ... GALE WARNING THROUGH WED... .TONIGHT...NW WINDS INCREASING TO 45 KT LATE. SEAS 8 FT. .WED...N WINDS 45 KT. SEAS 9 FT. FREEZING SPRAY. .WED NIGHT...NE STORM FORCE WINDS TO 50 KT. SEAS 9 FT. HEAVY FREEZING SPRAY. .THU...NE STORM FORCE WINDS TO 50 KT. SEAS 8 FT. HEAVY FREEZING SPRAY.

.THU NIGHT...N GALES TO 40 KT. SEAS 8 FT. FREEZING SPRAY. .FRI...N STORM FORCE WINDS TO 50 KT. SEAS 9 FT. FREEZING SPRAY. .SAT...E WINDS 30 KT. SEAS 6 FT. .SUN...E WINDS 20 KT. SEAS 4 FT. \$\$ PKZ022-291500-CROSS SOUND-400 PM AST TUE DEC 28 2004STORM WARNING WED MORNING.... .TONIGHT...E WINDS 45 KT. SEAS 8 FT. .WED...E WINDS 50 KT...BECOMING NE 40 KT IN THE AFTERNOON. SEAS 8 FT. FREEZING SPRAY. .WED NIGHT...E STORM FORCE WINDS TO 55 KT. SEAS 9 FT. FREEZING SPRAY. .THU...NE STORM FORCE WINDS TO 50 KT. SEAS 8 FT. HEAVY FREEZING SPRAY. .THU NIGHT...NE GALES TO 40 KT. SEAS 8 FT. FREEZING SPRAY. .FRI...NE STORM FORCE WINDS TO 50 KT...DIMINISHING TO NE GALES TO 45 KT IN THE AFTERNOON. SEAS 7 FT. FREEZING SPRAY. .SAT...NE WINDS 30 KT. SEAS 5 FT. .SUN...NE WINDS 20 KT. SEAS 4 FT. \$\$ PKZ031-291500-STEPHENS PASSAGE-400 PM AST TUE DEC 28 2004 ...GALE WARNING LATE TONIGHT AND WED... .TONIGHT...N WINDS 30 KT...BECOMING NW 40 KT LATE. SEAS 7 FT. SNOW SHOWERS IN THE EVENING. .WED...N WINDS 45 KT. SEAS 9 FT. .WED NIGHT...NE STORM FORCE WINDS TO 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .THU...NE STORM FORCE WINDS TO 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .THU NIGHT...NE STORM FORCE WINDS TO 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .FRI...NW GALES TO 45 KT. SEAS 9 FT. HEAVY FREEZING SPRAY. .SAT...E GALES TO 35 KT. SEAS 7 FT. .SUN...NE WINDS 30 KT. SEAS 6 FT. \$\$ PKZ032-291500-CHATHAM STRAIT NORTH OF POINT GARDNER-400 PM AST TUE DEC 28 2004 ... GALE WARNING LATE TONIGHT AND WED... .TONIGHT...N WINDS INCREASING TO N 35 KT LATE. SEAS 7 FT. RAIN AND SNOW SHOWERS IN THE EVENING. .WED...N WINDS INCREASING TO 45 KT IN THE AFTERNOON. SEAS 9 FT. .WED NIGHT...N STORM FORCE WINDS TO 50 KT. SEAS 10 FT. FREEZING SPRAY.

.THU...N STORM FORCE WINDS TO 50 KT. SEAS 10 FT. HEAVY FREEZING SPRAY. .THU NIGHT...N GALES TO 45 KT. SEAS 9 FT. FREEZING SPRAY. .FRI...N GALES TO 40 KT. SEAS 8 FT. FREEZING SPRAY. .SAT...N GALES TO 35 KT. SEAS 7 FT. .SUN...N WINDS 25 KT. SEAS 5 FT. \$\$ PKZ033-291500-CHATHAM STRAIT SOUTH OF POINT GARDNER-400 PM AST TUE DEC 28 2004 ... SMALL CRAFT ADVISORY THROUGH WED... .TONIGHT...N WINDS INCREASING TO N 25 KT LATE. SEAS 14 FT. SHOWERS IN THE EVENING. .WED...N WINDS 30 KT. SEAS 9 FT. .WED NIGHT...N WINDS 30 KT. SEAS 8 FT. .THU...N WINDS 30 KT. SEAS 6 FT. FREEZING SPRAY. .THU NIGHT THROUGH FRI...N WINDS 30 KT. SEAS 5 FT. FREEZING SPRAY. .SAT THROUGH SUN...N WINDS 30 KT. SEAS 6 FT. \$\$ PKZ034-291500-FREDERICK SOUND-400 PM AST TUE DEC 28 2004 ... SMALL CRAFT ADVISORY THROUGH WED... .TONIGHT...NE WINDS 25 KT. SEAS 5 FT. RAIN AND SNOW SHOWERS IN THE EVENING. .WED...NE WINDS 30 KT. SEAS 6 FT. .WED NIGHT...NE WINDS 30 KT. SEAS 6 FT. .THU...NE GALES TO 40 KT. SEAS 8 FT. HEAVY FREEZING SPRAY. .THU NIGHT...NE GALES TO 40 KT. SEAS 8 FT. HEAVY FREEZING SPRAY. .FRI...NE WINDS 15 KT...INCREASING TO NE 25 KT IN THE AFTERNOON. SEAS 4 FT. FREEZING SPRAY. .SAT...E GALES TO 35 KT. SEAS 7 FT. .SUN...NE WINDS 30 KT. SEAS 6 FT. \$\$ PKZ035-291500-SUMNER STRAIT-400 PM AST TUE DEC 28 2004 ... SMALL CRAFT ADVISORY TONIGHT AND WED... .TONIGHT...NE WINDS 25 KT...DIMINISHING LATE. SEAS 10 FT. .WED...NE WINDS INCREASING TO 30 KT IN THE AFTERNOON. SEAS 7 FT. .WED NIGHT...NE WINDS 30 KT. SEAS 6 FT. .THU...NE GALES TO 40 KT. SEAS 8 FT. FREEZING SPRAY. .THU NIGHT...NE GALES TO 40 KT. SEAS 8 FT. HEAVY FREEZING SPRAY. .FRI...NE WINDS 30 KT. SEAS 5 FT. FREEZING SPRAY IN THE MORNING. .SAT THROUGH SUN...NE WINDS 30 KT. SEAS 6 FT.

PKZ036-291500-CLARENCE STRAIT-400 PM AST TUE DEC 28 2004

... SMALL CRAFT ADVISORY WED AFTERNOON...

.TONIGHT...SE WINDS 20 KT. SEAS 7 FT. .WED...E WINDS 20 KT...BECOMING N 30 KT IN THE AFTERNOON. SEAS 6 FT. .WED NIGHT...N GALES TO 35 KT. SEAS 7 FT. .THU...NE GALES TO 40 KT. SEAS 8 FT. FREEZING SPRAY. .THU NIGHT...NE GALES TO 40 KT. SEAS 8 FT. HEAVY FREEZING SPRAY. .FRI...NE GALES TO 35 KT. SEAS 6 FT. FREEZING SPRAY. .SAT THROUGH SUN...E WINDS 30 KT. SEAS 5 FT.

\$\$

1.2 Example of a WFO Fairbanks Coastal Waters Forecast.

FZAK59 PAFG 180045 CWFAFG

NORTHERN ALASKA COASTAL WATERS FORECAST NATIONAL WEATHER SERVICE FAIRBANKS AK 400 PM AST WED JAN 21 2004

WESTERN AND ARCTIC ALASKAN COASTAL WATERS

WIND FORECASTS REFLECT THE PREDOMINANT SPEED AND DIRECTION EXPECTED. SEA FORECASTS REPRESENT THE AVERAGE OF THE HIGHEST ONE-THIRD OF THE COMBINED WIND WAVE AND SWELL HEIGHT.

PKZ299-181300-400 PM AST WED JAN 21 2004

.SYNOPSIS FOR WESTERN ALASKA AND THE ARCTIC COAST...A 965 MB LOW IN THE CENTRAL BERING SEA WILL REMAIN NEARLY STATIONARY WEST OF ST MATTHEW ISLAND WEAKENING THROUGH FRI.

\$\$ AREA 9A PKZ290-181300-NORTON SOUND SLEDGE ISLAND TO NUNAKTUK ISLAND-400 PM AST WED JAN 21 2004

... BRISK WIND ADVISORY THU...

.TONIGHT...NW WIND TO 15 KT. SEAS IN ICE FREE WATERS TO 3 FT. .THU...NW WIND TO 30 KT. SEAS IN ICE FREE WATERS TO 10 FT. .THU NIGHT...VARIABLE WIND TO 15 KT. SEAS IN ICE FREE WATERS TO 3 FT. .FRI...NE WIND TO 20 KT. SEAS IN ICE FREE WATERS TO 4 FT. .FRI NIGHT...NE WIND 20 KT BECOMING NW. SEAS IN ICE FREE WATERS TO 4 FT. .SAT...NW WIND 20 KT. SEAS IN ICE FREE WATERS TO 4 FT. .SUN...NE WIND 20 KT. SEAS IN ICE FREE WATERS TO 3 FT.

.MON...NW WIND TO 15 KT. SEAS IN ICE FREE WATERS 3 FT. \$\$ AREA 9B PKZ295-181300-DALL POINT TO WALES INCLUDING ST LAWRENCE ISLAND-400 PM AST WED JAN 21 2004 ... SMALL CRAFT ADVISORY THU... .TONIGHT...NW WIND TO 15 KT. SEAS TO 3 FT. .THU...NW WIND TO 30 KT. SEAS TO 7 FT. .THU NIGHT...VARIABLE WIND TO 15 KT. SEAS TO 3 FT. .FRI...NE WIND TO 20 KT. SEAS TO 4 FT. .FRI NIGHT...NE WIND 20 KT BECOMING NW. SEAS TO 4 FT. .SAT...NW WIND 20 KT. SEAS TO 4 FT. .SUN...NW WIND 20 KT. SEAS TO 3 FT. .MON...NW WIND TO 15 KT. SEAS IN ICE FREE WATERS 3 FT. \$\$ AREA 10A PKZ200-181300-KOTZEBUE SOUND-400 PM AST WED JAN 21 2004 ... BRISK WIND ADVISORY THU... .TONIGHT...NW WIND TO 15 KT. .THU...NW WIND TO 30 KT. BLOWING SNOW. VSBY LESS THAN 1 NM. .THU NIGHT...VARIABLE WIND TO 15 KT. .FRI...NE WIND TO 20 KT. .FRI NIGHT...NE WIND 20 KT BECOMING NW. .SAT...NW WIND 20 KT. .SUN...NW WIND 20 KT. .MON...NW WIND TO 15 KT. \$\$ AREA 10B PKZ205-181300-WALES TO CAPE LISBURNE-400 PM AST WED JAN 21 2004 ... BRISK WIND ADVISORY THU... .TONIGHT...NW WIND TO 15 KT. .THU AND THU NIGHT...NW WIND TO 30 KT. BLOWING SNOW. VSBY LESS THAN 1 NM. .FRI...NE WIND 30 KT. BLOWING SNOW. VSBY LESS THAN 1 NM. .FRI NIGHT...NE WIND 20 KT BECOMING NW. .SAT...NW WIND 20 KT. .SUN...NE WIND 20 KT. .MON...NW WIND TO 15 KT. \$\$ AREA 11A PKZ210-181300-CAPE LISBURNE TO CAPE HALKETT-

400 PM AST WED JAN 21 2004 ... BRISK WIND ADVISORY THU... .TONIGHT...NW WIND TO 15 KT. .THU AND THU NIGHT...NW WIND TO 30 KT. BLOWING SNOW. VSBY LESS THAN 1 NM. .FRI...NE WIND 25 KT. BLOWING SNOW. VSBY LESS THAN 1 NM. .FRI NIGHT...NE WIND 20 KT BECOMING NW. .SAT...NW WIND 10 TO 20 KT. .SUN...NE WIND 20 KT. .MON...NW WIND TO 15 KT. \$\$ AREA 11B PKZ215-181300-CAPE HALKETT TO DEMARCATION POINT-400 PM AST WED JAN 21 2004 ... BRISK WIND ADVISORY THU... .TONIGHT...NW WIND TO 15 KT. .THU AND THU NIGHT...NW WIND TO 30 KT. BLOWING SNOW. VSBY LESS THAN 1 NM. .FRI...NE WIND 30 KT. BLOWING SNOW. VSBY LESS THAN 1 NM. .FRI NIGHT...NE WIND 20 KT BECOMING NW. .SAT...NW WIND 20 KT. .SUN...NE WIND 20 KT. .MON...NW WIND TO 15 KT. \$\$ JL Example of a WFO Anchorage Coastal Waters Forecast. 1.3 FZAK51 PAFC 021300 CWFAER SOUTHCENTRAL ALASKA COASTAL WATERS FORECAST NATIONAL WEATHER SERVICE ANCHORAGE ALASKA 400 AM AST TUE NOV 2 2004 MARINE FORECAST FOR THE NORTHERN GULF OF ALASKA COAST UP TO 100 NM OUT INCLUDING KODIAK ISLAND AND COOK INLET WIND FORECASTS REFLECT THE PREDOMINANT SPEED AND DIRECTION EXPECTED. SEA FORECASTS REPRESENT AN AVERAGE OF THE HIGHEST ONE-THIRD OF THE COMBINED WIND WAVE AND SWELL HEIGHT. PKZ197-030300-.SYNOPSIS FOR THE NORTH GULF COAST+KODIAK ISLAND WATERS+ COOK INLET...A 984 MB LOW NEAR YAKUTAT WILL MOVE INLAND AND WEAKEN TODAY. A 967 MB LOW 80 NM SOUTH OF SAINT PAUL WILL MOVE TO NEAR KING SALMON AND STRENGTHEN TO 954 MB TUE NIGHT. THIS LOW WILL MOVE INTO THE EASTERN INTERIOR AND WEAKEN THROUGH WED NIGHT. \$\$ PKZ120-030300-

AREA 2B. CAPE SUCKLING TO GORE POINT 400 AM AST TUE NOV 2 2004 ... STORM WARNING TONIGHT... .TODAY...W WIND 30 KT BECOMING SE 25 KTS IN THE AFTERNOON. SEAS 13 FT. AREAS OF FOG. .TONIGHT...SE WIND 40 KT BECOMING S 55 KT AFTER MIDNIGHT. SEAS 23 FT. RAIN AND AREAS OF FOG. .WED...SW WIND 40 KT. SEAS 31 FT. RAIN AND AREAS OF FOG. .WED NIGHT...SW WIND 35 KT. SEAS 31 FT. .THU...W WIND 30 KT. SEAS 22 FT. .FRI...NW WIND 20 KT. SEAS 11 FT. .SAT...SE WIND 25 KT. SEAS 12 FT. \$\$ PKZ121-030300-AREA 2B1. RESURRECTION BAY 400 AM AST TUE NOV 2 2004 ... HEAVY FREEZING SPRAY WARNING TONIGHT... ... GALE WARNING TONIGHT... .TODAY...N WIND 15 KT BECOMING S 20 KT IN THE AFTERNOON. SEAS 4 FT. SNOW. FREEZING SPRAY. .TONIGHT...S WIND 40 KT. GUSTS TO 60 KT AFTER MIDNIGHT. SEAS 9 FT. SNOW AND AREAS OF FOG. HEAVY FREEZING SPRAY. .WED...S WIND 30 KT BECOMING S 20 KT IN THE AFTERNOON. SEAS 7 FT. SNOW SHOWERS. AREAS OF FOG. FREEZING SPRAY. .WED NIGHT...S WIND 20 KT. SEAS 6 FT. .THU...N WIND 15 KT. SEAS 4 FT. .FRI...VARIABLE WIND 10 KT. SEAS 2 FT. .SAT...S WIND 15 KT. SEAS 3 FT. \$\$ PKZ125-030300-AREA 2C. PRINCE WILLIAM SOUND 400 AM AST TUE NOV 2 2004 ... STORM WARNING TONIGHT... .TODAY...W WIND 35 KTS DIMINISHING TO VARIABLE 15 KT IN THE AFTERNOON. SEAS 7 FT SUBSIDING 4 FT. PATCHY FOG. .TONIGHT...SE WIND INCREASING TO 50 KT AFTER MIDNIGHT. SEAS 13 FT. RAIN AND AREAS OF FOG. .WED...S WIND 35 KT. SEAS 9 FT. RAIN AND AREAS OF FOG. .WED NIGHT...SW WIND 25 KT. SEAS 6 FT. .THU...W WIND 15 KT. SEAS 3 FT. .FRI...NW WIND 15 KT. SEAS 4 FT. .SAT...SE WIND 30 KT. SEAS 9 FT. \$\$ PKZ129-030300-AREA 2C4. PASSAGE CANAL 400 AM AST TUE NOV 2 2004 ... GALE WARNING TONIGHT... .TODAY...W WIND 20 KT BECOMING E 15 KT IN THE AFTERNOON. SEAS 3 FT. AREAS OF FOG. .TONIGHT...E WIND 40 KT. SEAS 6 FT. SNOW AND AREAS OF FOG. FREEZING SPRAY. .WED...E WIND 25 KT DIMINISHING TO 15 KT IN THE AFTERNOON. SEAS 5 FT. RAIN AND SNOW SHOWERS AND AREAS OF FOG.

.WED NIGHT THROUGH FRI...VARIABLE WIND 10 KT. SEAS 2 FT. .SAT...E WIND 20 KT. SEAS 3 FT. \$\$ PKZ130-030300-AREA 3A. BARREN ISLANDS AND KAMISHAK BAY WATERS 400 AM AST TUE NOV 2 2004 ... GALE WARNING TODAY THROUGH WEDNESDAY... .TODAY...WIND INCREASING TO SE 45 KT IN THE AFTERNOON. SEAS BUILDING TO 15 FT. RAIN AND SNOW. .TONIGHT...SW WIND 40 KT. SEAS 15 FT. RAIN. .WED AND WED NIGHT...W WIND 35 KT. SEAS 12 FT. .THU...W WIND 30 KT. SEAS 8 FT. .FRI...NE WIND 25 KT. SEAS 6 FT. .SAT...N WIND 20 KT. SEAS 6 FT. \$\$ PKZ132-030300-AREA 3B. SHUYAK ISLAND TO SITKINAK 400 AM AST TUE NOV 2 2004 ... STORM WARNING TODAY THROUGH WEDNESDAY... .TODAY...SW WIND 30 KT INCREASING S 50 KT IN THE AFTERNOON. SEAS BUILDING TO 25 FT. RAIN AND AREAS OF FOG. .TONIGHT...SW WIND 50 KT. SEAS 29 FT. RAIN AND AREAS OF FOG. .WED...SW WIND 50 KT DIMINISHING TO 40 KTS IN THE AFTERNOON. SEAS 29 FT. AREAS OF FOG. .WED NIGHT...W WIND 35 KT. SEAS 21 FT. .THU...W WIND 30 KT. SEAS 15 FT. .FRI...SW WIND 25 KT. SEAS 10 FT. .SAT...W WIND 20 KT. SEAS 10 FT. \$\$ PKZ138-030300-AREA 3C. SHELIKOF STRAIT 400 AM AST TUE NOV 2 2004 ... GALE WARNING TODAY THROUGH WEDNESDAY... .TODAY...SE WIND 25 KT BECOMING SW 45 KT IN THE AFTERNOON. SEAS 12 FT. RAIN AND SNOW. .TONIGHT...SW WIND 45 KT. SEAS 15 FT. RAIN. .WED...SW WIND 40 KT DIMINISHING TO W 30 KT IN THE AFTERNOON. SEAS 12 FT. .WED NIGHT...SW WIND 35 KT. SEAS 8 FT. .THU...W WIND 25 KT. SEAS 6 FT. .FRI...SW WIND 20 KT. SEAS 7 FT. .SAT...NW WIND 20 KT. SEAS 6 FT. \$\$ PKZ140-030300-AREA 4. COOK INLET NORTH OF KAMISHAK BAY AND ENGLISH BAY 400 AM AST TUE NOV 2 2004 ... GALE WARNING TODAY THROUGH WEDNESDAY... .TODAY...NE WIND 20 KT INCREASING TO 35 KT IN THE AFTERNOON. SEAS 9 FT. SNOW. FREEZING SPRAY. .TONIGHT...NE WIND 35 KT. OUT OF TURNAGAIN ARM...GUSTS TO 70 KT DIMINISHING TO 45 KT AFTER MIDNIGHT. SEAS 9 FT. SNOW. FREEZING SPRAY. .WED...SW WIND 35 KT. SEAS 9 FT. RAIN.

.WED NIGHT...SW WIND 30 KT. SEAS 8 FT. .THU...W WIND 25 KT. SEAS 7 FT. .FRI AND SAT...N WIND 15 KT. SEAS 6 FT.

\$\$ PKZ141-030300-AREA 4A. KACHEMAK BAY 400 AM AST TUE NOV 2 2004

... GALE WARNING TODAY...

.TODAY...NE WIND 15 KT BECOMING E 35 KT IN THE AFTERNOON. SEAS BUILDING TO 8 FT IN THE AFTERNOON. SNOW. .TONIGHT...S WIND 25 KT. SEAS 4 FT. RAIN AND SNOW. .WED...SW WIND 25 KT. SEAS 7 FT. RAIN. .WED NIGHT...SW WIND 25 KT. SEAS 7 FT. .THU...W WIND 30 KT. SEAS 8 FT. .FRI AND SAT...NE WIND 20 KT. SEAS 4 FT.

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1.4 Example of a WSO Coastal Waters Forecast.

FZAK57 PAYA 101240 CWFYAK

MARINE FORECAST FOR YAKUTAT BAY NATIONAL WEATHER SERVICE YAKUTAT AK 400 AM AST WED DEC 10 2003

PKZ053-110100-YAKUTAT BAY-400 AM AST WED DEC 10 2003

....SMALL CRAFT ADVISORY THROUGH THU...

.TODAY...SE WINDS 25 KT. SEAS 4 FT. RAIN. .TONIGHT...SE WINDS 25 KT. SEAS 4 FT. RAIN. .THU...SE WINDS 25 KT. WITH GUST TO 35 KT. SEAS 5 FT. .THU NIGHT...SE WINDS 20 KT. SEAS 3 FT. RAIN. .FRI...S WINDS 25 KT. SEAS 4 FT. RAIN. .SAT...S WINDS 15 KT. SEAS 3 FT. .SUN...SE GALES 40 KT. SEAS 6 FT.

\$\$ DC DEC 03