



# Eisbericht Nr. 48

## Amtsblatt des BSH

Jahrgang 95

Nr. 48

Thursday, 03.02.2022

1

### Übersicht

In den Schären der Bottenwiek liegt im Norden 25–55 cm dickes Festeis und im Süden 20–55 cm dickes Festeis. Außerhalb des Festeises im Norden und Osten kommt zuerst ebenes Eis vor und dann treibt auf See 20–50 cm dickes, sehr dichtes, aufgepresstes Eis. Außerhalb des Festeises im Westen kommt zuerst ebenes Eis und dann dichtes Eis vor. Im Süden treibt auf See meist 5-20cm dickes, dichtes Eis. In Norra Kvarken liegt in den Schären bis zu 55 cm dickes Festeis und auf See treibt 5-20cm dickes, dichtes Eis und Neueis. Entlang der Küsten und in den Schären der Bottensee, dem Schärenmeer und der Ålandsee liegt Festeis oder dünnes ebenes Eis und Neueis. Im Finnischen Meerbusen liegt entlang der Nordküste und im Osten bis 40 cm dickes Festeis, östlich von etwa 27°30' treibt auf See meist dichtes bis sehr dichtes, 10–30 cm dickes Eis. Im Rigaischen Meerbusen befindet sich bis zu 25 cm dickes Eis im Moonsund und in der Pärnubucht. Dünnes, teilweise ebenes Eis kommt örtlich in der nördlichen Ostsee, dem Vänern und der südöstlichen Ostsee vor. Dünnes Eis kommt in geschützten Buchten der zentralen Ostsee vor. In einigen inneren Fjorden des Skagerraks liegt dünnes Eis oder Festeis.

### Overview

In the archipelagos of the Bay of Bothnia, there is 25–55 cm thick fast ice in the north and 20–55 cm thick fast ice in the south. Off the eastern and northern fast ice, there a level ice followed by very close, 20–50 cm thick, ridged ice. Off the fast ice in the west, there is level ice followed by close ice. In the southern part, there is mostly 5-20cm thick close ice. In Norra Kvarken, there is up to 55 cm thick fast ice in the archipelagos and thin ice at sea. Along the coasts and archipelagos of the Sea of Bothnia, the Archipelago Sea and Åland Sea, there is fast ice or thin level ice and new ice. In the Gulf of Finland, there is up to 40 cm thick fast ice along the northern and eastern coast. At sea, east of about 27°30'E there is mostly close or very close, 10–30 cm thick ice. In the Gulf of Riga, there is up to 25 cm thick ice in Moonsund and Pärnu Bay. Thin ice and thin level ice occurs at places in the northern Baltic, Lake Vänern and the southeastern Baltic. Thin ice occurs in sheltered areas of the central Baltic. Fast ice or thin ice is present in some inner fjords of the Skagerrak.

### Bay of Bothnia

In the archipelagos of the northern Bay of Bothnia, there is 25–55 cm thick fast ice, from the Finnish coast reaching out to Kemi-3, Oulu-2 and Johan. Off the fast ice in the east, there is 20–50 cm thick consolidated ice to Kemi-2 – Oulu-1 – Raahe light-house. Farther out there is thin level ice and new

ice east of about 23°30'E and also north of 65°10'N. Further out ridged 20–50 cm thick close and very close ice. Out of the fast ice in the west, there is first thin level ice and 5-20cm thick close ice further east. In the southern Bay of Bothnia, there is 20–40 cm thick fast ice along the Swedish

#### Herstellung und Vertrieb

Bundesamt für Seeschifffahrt und Hydrographie (BSH)

[www.bsh.de/eis](http://www.bsh.de/eis)

[www.bsh.de/ice](http://www.bsh.de/ice)

© BSH - Alle Rechte vorbehalten  
 Nachdruck, auch auszugsweise, verboten

#### Eisankünfte / Ice Information

Telefon: +49 (0) 381 4563 -780

Telefax: +49 (0) 381 4563 -949

E-Mail: [ice@bsh.de](mailto:ice@bsh.de)

© BSH - All rights reserved  
 Reproduction in whole or in part prohibited

coast and 25–55 cm thick fast ice in the eastern archipelagos. Further out on the Finnish side, there is thin level ice and 10–35 cm thick close and very close ice. On the Swedish side, there is 5–20cm thick close ice. Larger ice free areas are absent.

#### **Norra Kvarken**

In the archipelagoes off Vaasa, there is 25–55 cm thick fast ice to Ensten; further out to Norra Globsten, there is 10–30 cm thick very close ice. Along the Swedish coast, there is 20–40 cm thick fast in the inner archipelagos. At sea, there is mostly 5–

#### **Sea of Bothnia**

On Ångermanälven, there is 20–50 cm thick fast ice in the upper part and 10–35 cm fast or level ice in the lower part. Along the eastern coast, there is 10–30 cm fast ice in the inner archipelagos and outside a 20nm wide area with new ice. In the bays along the western coast, there is 10–30 cm thick

#### **Archipelago and Åland Sea**

5–20cm thick ice is present in inner archipelagos of the coasts and around the Åland islands. In the outer archipelago at the eastern coast, there is

#### **Gulf of Finland**

From St. Petersburg up to the longitude of Tolbuchin lighthouse there is 30–40 cm thick fast ice, followed by 20–30cm thick very open ice out to about 29°08'E. In the Bay of Vyborg, there is 25–35 cm fast ice, followed by 10–15cm thick very close ice out to about 27°39'E. In the Bjerkesund, there is 20–40 cm thick fast ice or 15–25 cm thick compact ice. At sea, south of about 60°15'N and reaching the southern coast, there is 10–20cm thick close ice between 26°50'E and 28°E and 15–30cm thick very close ice further east. In the archi-

#### **Gulf of Riga**

In Moonsund, there is 10–20 cm thick fast ice near the coasts and on the fairways there is new ice; in Suur strait there is very close ice. In Pärnu Bay, there is 15–25 cm thick fast or very close ice in the eastern part and in the western part there is a 2–

#### **Northern Baltic**

In Lake Mälaren, there is 10–30 cm thick fast ice or level ice in the western part; further east there is thin level or new ice. Along the Swedish coast,

#### **Central Baltic**

Thin open ice or new ice occurs in sheltered bays along the Swedish coast. Port of Liepaja is ice free

#### **Southeastern Baltic**

In the Curonian Lagoon, there is very close, 5–15 cm thick ice in the eastern part.

The ice drift will veer towards the northwest and increase in strength tomorrow, while during the same time new ice formation will be weaker than before.

20cm thick close ice and new ice further south. New ice formation will continue during the night, but then slowly cease tomorrow. An increasing northwesterly ice drift is expected.

fast ice and outside new ice is present along the coast.

New ice formation will begin to cease in the western part but continue in the eastern part. The northwestward ice drift will be increasing.

open water and new ice at places.

New ice formation will slowly cease and a beginning northwesterly ice drift is expected.

pelagos of the northern coast, there is fast ice, 10–30 cm thick in the west and 20–40 cm thick in the east, outside at sea new ice is present east of 26°E. In Luga bay, 15–25 cm thick, very close ice is present with open ice in the entrance; in Narva Bay, there is fast ice near the coast, new ice and close ice is present further out. Else, there is new ice in the bays of Kunda, Muuga and Tallin.

New ice formation will continue and the ice will start to drift to the northwest.

4km wide fast ice belt. New ice is present at sea in the northeast. In the port of Riga there is 5–10cm thick very open ice.

Only minor new ice formation and a northwesterly ice drift are expected.

there is new ice or thin open ice in sheltered bays. No larger changes are expected.

again. No larger changes are expected.

No larger changes are expected.

**Skagerrak and Kattegat**

In some inner fjords of the Skagerrak, there is fast ice, up to 30 cm thick at a few places.

No larger changes are expected.

**Swedish Lakes**

In Lake Vänern there is 5-20cm thick fast ice or new ice in bays of the northern coast.

With increasing air temperatures, some ice melt may occur during the next days.

Dr. J.Holfort

**Restrictions to Navigation**

	<b>Harbour/District</b>	<b>At least dwt/hp/kW</b>	<b>Ice Class</b>	<b>Begin</b>
<b>Estonia</b>	Pärnu	1600 kW	1C	17.12.
<b>Finland</b>	Tornio, Kemi and Oulu	4000 dwt	IA	16.01.
	Raahe	2000 dwt	IA	16.01.
	Kokkola, Kalajoki, Pietarsaari and Vaasa	2000 dwt	IA	01.02.
	Kristiinankaupunki, Pori, Rauma, Uusikaupunki, Naantali, Turku, Koverhar, Lappohja, Helsinki and Sköldvik	2000 dwt	II	01.01.
	Kaskinen, Taalintehdas, Förby, Inkoo, Kantvik	2000 dwt	I	16.01.
	Loviisa and Kotka	2000 dwt	I	04.01.
	Hamina Mussalo	2000 dwt 2000 dwt	I II	01.01. 25.12.
<b>Russia</b>	Vyborg	-	Ice 1	30.12.
	Vysotsk	-	Ice 2	14.01.
	Primorsk	-	Ice 2	27.01.
	Ust-Luga	-	Ice 1	04.01.
	St. Petersburg	-	required	31.12.
<b>Sweden</b>	Karlsborg and Luleå	2000 dwt	IB	06.01.
	<b>Karlsborg and Luleå</b>	<b>2000 dwt</b>	<b>IA</b>	<b>08.02.</b>
	Haraholmen and Skelleftehamn	2000 dwt	IB	06.01.
	Holmsund, Rundvik and Husum	2000 dwt	IC	15.01.
	Örnsköldsvik	2000 dwt	IC	15.01.
	Ångermanälven	2000 dwt	IB	06.01.
	Härnösand - Skutskär	2000 dwt	II	22.12.
	Köping and Västerås	2000 dwt	IC	27.12.
	Bålsta	1300/2000 dwt	IC/II	27.12.

**Information of the Icebreaker Services****Estonia**

**Icebreaker:** EVA-316 assists to the port of Pärnu.

**Finland/Sweden**

The icebreaking season has ended in Lake Saimaa and Saimaa Canal. The Saimaa Canal was closed for traffic on 30th of January.

The traffic separation schemes in the Quark are temporarily out of use from 15 January 2022.

Vessels bound for Gulf of Bothnia ports in which assistance restrictions apply, shall when passing latitude 60° 00' N report their nationality, name, destination, ETA and speed to ICE INFO on VHF channel 78. This report can also be given directly by telephone to +46 10 492 7600.

Vessels bound for Finnish or Swedish ports with assistance restrictions in the Quark or the Bay of Bothnia

shall, 20 nautical miles before Nordvalen Lighthouse (63° 32.15' N 20° 46.60' E), report in accordance with the instructions for winter navigation to Bothnia VTS on VHF channel 67.

**Icebreakers:**

OTSO, KONTIO, URHO, POLARIS, FREJ and YMER assist in the Bay of Bothnia. ALE and ZEUS assist in the Quark and VOIMA in the eastern Gulf of Finland.

**Norway**

Husøysund, Tønsberg indre havn and Vestfjorden (Tønsberg): Icebreaker assistance can only be given to vessels suitable for navigation in ice and of special size. (28.12.21)

Hellefjorden (Kragerø): Navigation temporarily closed. (10.01.22)

**Russia**

There are restrictions for small crafts going to Vysotsk, Vyborg, St. Petersburg, Ust-Luga and Primorsk.

**Icebreakers:** Several icebreakers assist vessels to the port of Vyborg, Vysotsk, Primorsk, Ust-Luga and St. Petersburg.

**Baltic Sea Ice Code**

<p>First number:</p> <p><b>A<sub>B</sub> Amount and arrangements of sea ice</b></p> <p>0 Ice free</p> <p>1 Open water – concentration less than 1/10</p> <p>2 Very open ice - concentration 1/10 to 3/10</p> <p>3 Open ice – concentration 4/10 to 6/10</p> <p>4 Close ice – concentration 7/10 to 8/10</p> <p>5 Very close ice – concentration 9/10 to 9+/10</p> <p>6 Compact ice, including consolidated ice – concentration 10/10</p> <p>7 Fast ice with drift ice outside</p> <p>8 Fast ice</p> <p>9 Lead in very close or compact drift ice or along the fast ice edge</p> <p>/ Unable to report</p> <p>Third number:</p> <p><b>T<sub>B</sub> Topography or form of ice</b></p> <p>0 Pancake ice, ice cakes, brash ice – less than 20 m across</p> <p>1 Small ice floes – 20 to 100 m across</p> <p>2 Medium ice floes – 100 to 500 m</p> <p>3 Big ice floes – 500 to 2000 m across</p> <p>4 Vast or giant ice floes – more than 2000 m across – or level ice</p> <p>5 Rafted ice</p> <p>6 Compact slush or shuga, or compacted brash ice</p> <p>7 Hummocked or ridged ice</p> <p>8 Thaw holes or many puddles on the ice</p> <p>9 Rotten ice</p> <p>/ No information or unable to report</p>	<p>Second number:</p> <p><b>S<sub>B</sub> Stage of ice development</b></p> <p>0 New ice or dark nilas (less than 5 cm thick)</p> <p>1 Light nilas (5 - 10 cm thick) or ice rind</p> <p>2 Grey ice (10 - 15 cm thick)</p> <p>3 Grey-white ice (15 - 30 cm thick)</p> <p>4 White ice, first stage (30 - 50 cm thick)</p> <p>5 White ice, second stage (50 - 70 cm thick)</p> <p>6 Medium first year ice (70 - 120 cm thick)</p> <p>7 Ice predominantly thinner than 15 cm with some thicker ice</p> <p>8 Ice predominantly grey-white ice (15 – 30 cm) with some thicker ice</p> <p>9 Ice predominantly thicker than 30 cm with some thinner ice</p> <p>/ No information or unable to report</p> <p>Fourth number:</p> <p><b>K<sub>B</sub> Navigation conditions in ice</b></p> <p>0 Navigation unobscured</p> <p>1 Navigation difficult or dangerous for wooden vessels without ice sheathing</p> <p>2 Navigation difficult for unstrengthened or low-powered vessels built of iron or steel. Navigation for wooden vessels even with ice sheathing not advisable</p> <p>3 Navigation without icebreaker assistance possible only for high-powered vessels of strong construction and suitable for navigation in ice</p> <p>4 Navigation proceeds in lead or broken ice-channel without the assistance of an icebreaker</p> <p>5 Icebreaker assistance can only be given to vessels suitable for navigation in ice and of special size</p> <p>6 Icebreaker assistance can only be given to vessels of special ice class and of special size</p> <p>7 Icebreaker assistance can only be given to vessels after special permission</p> <p>8 Navigation temporarily closed</p> <p>9 Navigation has ceased</p> <p>/ Unknown</p>
---	---

**Estonia , 03.02.2022**

Shipping route from Narva-Jõssuu	73/2
Kunda, port and bay	30/0
Muuga, port and bay	1000
Tallinn, port and bay	1000
Paernu, port and bay	73/5
Shipp. route from Paernu to Irben Strait	52/3
Moonsund	72/3

**Finland , 03.02.2022**

Roeyttae – Etukari	8446
Etukari – Ristinmatala	8846
Ajos – Ristinmatala	8846
Ristinmatala – Kemi 2	6876
Kemi 2 – Kemi 1	5146
Sea area SW of Kemi 1	5146
Kemi 2 – Ulkokrunni – Virpiniemi	8446
Oulu harbours – Kattilankalla	8446

Kattilankalla – Oulu 1	6876	<b>Latvia , 03.02.2022</b>	
Sea area SW of Oulu 1	5146	Port of Riga	2001
High Sea N of the latitude of Marjaniemi	5846		
Raahe harbour – Heikinkari	8346	<b>Norway , 01.02.2022</b>	
Heikinkari – Raahe lighthouse	6366	Langårsund (Kragerø)	4212
Raahe lighthouse – Nahkiainen	5146		
Latitude Marjaniemi – Ulkokalla, Sea	5876	<b>Russian Federation , 03.02.2022</b>	
Rahja harbour – Välimatala	6366	Port of St. Petersburg	84/3
Vaelimatala to line Ulkokalla – Ykskivi	5746	St. Petersburg – E-point island Kotlin	84/3
Sea betw. lat. of Ulkokalla –Pietarsaari	4346	E-point Kotlin – long. lighth. Tolbuhkin	84/3
Ykspihlaja – Repsaer	8846	Lighth. Tolbuhkin – lighth. –Šepelevskij	2312
Repskaer – Kokkola lighthouse	6366	Lighthouse Šepelevskij – island Sescar	53/3
Sea area off Kokkola lighthouse	4746	Island Sescar – Island Sommers	53/3
Pietarsaari – Kallan	7846	Island Sommers– S-point island Gogland	43/2
Sea area off Kallan	5246	S-point isl. Gogland – long. p. Kunda	3322
Sea lat. Pietarsaari – NE Nordvalen	4746	Vyborg, port and bay	84/3
Sea area ENE of Nordvalen	4746	Island Vichrevoj – Island Sommers	52/2
Sea area Nordvalen to W of Norrskaer	4246	Strait Bjerkesund	53/3
Vaskiluoto – Ensten	8446	E-point Bol'šoj Ber'ozovyj – Šepelevskij	53/3
Ensten – Vaasa lighthouse	5346	Luga bay	53/3
Vaasa lighthouse – Norrskaer	5146	Appr. Luga bay–line Moščnyj.- Šepel.	3312
Sea area SW of Norrskaer	3006		
Kaskinen – Sälgrund	5726	<b>Sweden , 03.02.2022</b>	
Sea area off Sälgrund	3126	Karlsborg – Maloeren	8546
High sea from N to latitude Yttergrund	3016	Sea area off Maloeren	5146
Pori harb. to line Pori lighth. – Säppi	5155	Luleå – Bjoernklack	8546
Sea W of line Pori lighthouse – Säppi	3015	Bjoernklack – Farstugrunden	5146
High sea betw. lat. Yttergrund a. Rauma	2005	E and SE of Farstugrunden	5146
Rauma, Harbour – Kylmäpihlaja	7745	Sandgroenn fairway	8546
Kylmäpihlaja – Rauma lighthouse	5145	Roedkallen – Norstroemsgrund	4336
Uusikaupunki harbour – Kirsta	8745	Haraholmen – Nygrån	8446
Kirsta – Isokari	5245	Sea area off Nygrån	5146
Isokari – Sandbaeck	4145	Skelleftehamn – Gåsoeren	4336
Sea area off Sandbaeck	2005	Sea area off Gåsoeren	4336
Naantali and Turku – Rajakari	4145	Sea area off Bjuroeklubb	4336
Rajakari – Lövskär	3005	NE of Nordvalen	4336
Lövskär – Korra	3005	SW of Nordvalen	4336
Korra – Isokari	4145	Western Quark (W of Holmoearna)	8346
Lövskär – Berghamn	3005	Umeå – Vaektaren	4046
Stora Sottunga – Ledskär	2005	SE of Vaektaren	4336
Lövskär – Grisselborg	3005	NE and SE of Sydostbrotten	4336
Hanko – Vitgrund	3005	Fairway to Husum	4046
Koverhar – Hästö Busö	2005	Oernskoeldsvik – Hoernskaten	8446
Inkoo a. Kantvik – sea area Porkkala	7206	Hoernskaten – Skagsudde	8446
Sea area at Porkkala	1005	Ångermanaelven north Sandoe Bridge	8444
Helsinki harbours – Harmaja	3005	Ångermanaelven south Sandoe Bridge	8444
Harmaja – Helsinki lighthouse	1005	Haernoessand – Haernoen	5044
Fairway Helsinki – Porkkala – Rönnskär	1005	Sea area off Haernoen	4041
Porvoo harbours – Varlax	3005	Sundsvall – Draghaellan	8346
Varlax – Porvoo lighthouse	2005	Draghaellan – Åstholmsudde	5046
Valko Harbour – Tåktarn	7746	Off Åstholmsudde and Braemoen	4046
Archipelago fairway Boistö – Glosholm	3015	Hudiksvallfjaerden	8346
Archipelago fairway Glosholm–Helsinki	1005	Iggesund – Agoe	8346
Kotka – Viikari	3006	Sandarne – Haellgrund	8346
Viikari – Orregrund	3005	Ljusnefjaerden – Storjungfrun	4046
Orregrund – Tiiskeri	3005	Sea area off Storjungfrun	4046
Hamina – Suurmusta	7846	Gaeve – Eggegrund	8346
Suurmusta – Merikari	3006	Oeregrundsgrepen	4041
Merikari – Kaunissaari	3006	Hallstavik – Svartklubben	8342
		Koeping – Kvicksund	8344

Västerås – Grönsö	8344
Grönsö – Södertälje	5044
Stockholm – Södertälje	5044
Södertälje – Fifong	5041
Norrköping – Hargökalv	4041
Västervik – Marsholmen – Idö	4041
Fairway to Karlstad	8342
Fairway to Kristinehamn	8342
Fairway to Otterbäcken	5041