

Spitsbergen-Svalbard. A complete guide around the arctic archipelago.

© Rolf Stange (www.spitzbergen.de)

Table of contents

Foreword...11

1. Preface...13
2. Introduction...14
3. Traveling in Svalbard: Useful, practical and important information...18
 - 3.1 Spitsbergen – seasons...18
 - 3.2 Spitsbergen – how to travel...21
 - 3.2.1 Expedition cruising...21
 - 3.2.2 Cruise ships...24
 - 3.2.3 Staying in Longyearbyen...24
 - 3.2.4 Individual hiking...25
 - 3.2.5 Organised hiking tours...26
 - 3.2.6 Canoe/kayak...26
 - 3.2.7 Dog sledging...26
 - 3.2.8 Skiing...27
 - 3.2.9 Snow mobile...27
 - 3.2.10 Horse-riding...28
 - 3.2.11 Helicopter...28
 - 3.2.12 Climbing...28
 - 3.2.13 Nonsense...29
 - 3.3 Tour operators...29
 - 3.4 Clothing, hygiene & the environment, photography...33
 - 3.5 Getting to Spitsbergen...37
 - 3.6 Conservation, cultural heritage, protected areas, safety...39
 - 3.6.1 Conservation and protected areas...40
 - 3.6.2 Polar bears and weapons, communication, safety in the field...45
 - 3.6.3 Registration of tours with the administration...49
 - 3.6.4 Tent and hut...51
 - 3.6.5 Other hazards in the field: rivers, glaciers, ice and snow, mud, rabies and other diseases, drinking water, mosquitos...53
 - 3.6.6 Orientation...56
 - 3.6.7 Cultural heritage...56
 - 3.7 Longyearbyen...58
 - 3.7.1 Services and infrastructure...58
 - 3.7.2 Accommodation, eating and drinking...65

3.7.3 Shopping...	70
3.7.4 Sights in Longyearbyen...	71
3.7.5 Activities near Longyearbyen...	74
3.7.6 From coal to space research: Longyearbyen through 100 years...	78
4. Natural history...	97
4.1 Geography, glaciers, permafrost...	97
4.2 Geology...	101
4.3 Oceanic currents...	106
4.4 Sea ice...	107
4.5 Driftwood, rubbish and environmental toxins...	110
4.6 Climate and weather...	112
4.7 Mammals...	114
4.7.1 Polar bear...	115
4.7.2 Arctic fox...	117
4.7.3 Svalbard reindeer...	118
4.7.4-4.7.7 Seals...	120
4.7.4 Bearded seal...	120
4.7.5 Ringed seal...	121
4.7.6 Walrus...	122
4.7.7 Harbour seal...	125
4.7.8-4.7.11 Whales...	126
4.7.8 Mink whale...	127
4.7.9 White whale...	128
4.7.10 Humpback whale...	128
4.7.11 Fin whale...	145
4.7.12 Bowhead whale...	146
4.7.13 Introduced species...	148
4.8 Birds...	148
4.8.1 Red-throated diver...	149
4.8.2 Northern Fulmar...	150
4.8.3 Common eider...	151
4.8.4 King eider...	152
4.8.5 Long-tailed duck...	153
4.8.6 Pink-footed goose...	154
4.8.7 Barnacle goose...	154
4.8.8 Rock ptarmigan...	155
4.8.9 Snow bunting...	156
4.8.10 Purple sandpiper...	157
4.8.11 Grey phalarope...	157
4.8.12 Arctic tern...	158

- 4.8.13 Great skua...160
- 4.8.14 Pomarine skua...160
- 4.8.15 Arctic skua...161
- 4.8.16 Long-tailed skua...162
- 4.8.17 Sabine's gull...163
- 4.8.18 Ivory gull...164
- 4.8.19 Ross' gull...164
- 4.8.20 Glaucous gull...165
- 4.8.21 Black-legged Kittiwake...166
- 4.8.22 Atlantic Puffin...166
- 4.8.23 Common guillemot...167
- 4.8.24 Brünic's guillemot...168
- 4.8.25 Little auk...169
- 4.8.26 Black guillemot...171
- 4.9 Plants...172
 - 4.9.1 Polar willow...174
 - 4.9.2 Dwarf birch...175
 - 4.9.3 Mountain sorrel...175
 - 4.9.4 Knotweed...176
 - 4.9.5 Arctic mouse-ear...176
 - 4.9.6 Tundra chickweed...176
 - 4.9.7 Fringed sandwort...176
 - 4.9.8 Nodding lychnis...193
 - 4.9.9 Moss campion...193
 - 4.9.10 Snow buttercup...193
 - 4.9.11 Svalbard poppy..193
 - 4.9.12 Scurvy grass...194
 - 4.9.13 Whitlow-grasses...194
 - 4.9.14 Purple saxifrage...194
 - 4.9.15 Yellow mountain saxifrage...195
 - 4.9.16 Alpine saxifrage...195
 - 4.9.17 Hawkweed-leaved saxifrage...195
 - 4.9.18 Bog saxifrage...196
 - 4.9.19 Drooping saxifrage...196
 - 4.9.20 Tufted saxifrage...196
 - 4.9.21 Spiderplant...196
 - 4.9.22 Mountain avens...197
 - 4.9.23 Arctic bell-heather...197
 - 4.9.24 Boreal Jacob's ladder...197
 - 4.9.25 Polar cress...198

- 4.9.26 Woolly lousewort...198
- 4.9.27 Arctic cottongrass...198
- 4.9.28 Arctic dandelion...199
- 4.9.29 Polar dandelion...199
- 4.9.30 Grasses, mosses, lichens & fungi...199

5. History...201

- 5.1 Vikings...203
- 5.2 Pomors...204
- 5.3 Willem Barents...206
- 5.4 Whaling in the 17th century...207
- 5.5 Early expeditions and science...210
- 5.6 Attempts to fly to the pole: Virgohamna and Ny Ålesund...216
- 5.7 Trappers...219
- 5.8 Whaling in the early 20th century...221
- 5.9 The Spitsbergen Treaty...222
- 5.10 Mining...224
- 5.11 The Second World War...226
- 5.12 Spitsbergen after the War...228

6. Fjords and islands, settlements and stations:

The regions of Svalbard...231

- 6.1 Isfjord...234
 - 6.1.1 Alkhornet, Trygghamna...236
 - 6.1.2 Ymerbukta...238
 - 6.1.3 Bohemanflya...238
 - 6.1.4 Ekmanfjord, Coraholmen, Flintholmen...240
 - 6.1.5 Dicksonfjord, western Dickson Land...242
 - 6.1.6 Eastern Dickson Land
(Skansbukta, Pyramiden), Billefjord...245
 - 6.1.7 Sassenfjord, Tempelfjord...250
 - 6.1.8 Adventfjord...254
 - 6.1.9 Grumantbyen, Colesbukta...262
 - 6.1.10 Grønfjord, Barentsburg...265
 - 6.1.11 Festningen, Russekeila, Kapp Linné/Isfjord Radio...270
- 6.2 Forlandsund east side...292
 - 6.2.1 St. Jonsfjord...292
 - 6.2.2 Kaffiøyra...293
 - 6.2.3 Engelskbukta...294
- 6.3 Prins Karls Forland...295

6.4	Kongsfjord...	297
6.4.1	Ny Ålesund...	300
6.4.2	Inner Kongsfjord...	309
6.4.3	Blomstrandhalvøya...	312
6.5	Krossfjord...	314
6.6	The northern west coast...	319
6.6.1	Dei Sju Isfjella...	319
6.6.2	Hamburgbukta...	320
6.6.3	Magdalenefjord...	321
6.7	Northwestern Spitsbergen...	323
6.7.1	Sørgattet, Bjørnfjord, Smeerenburgfjord...	324
6.7.2	Danskøya...	325
6.7.3	Amsterdamøya...	328
6.7.4	Fair Haven, Fuglefjord, Sallyhamna...	330
6.7.5	Nordvestøyane: Fugløya, Fuglesangen, Klovningen, Ytre Norskøya, Indre Norskøya...	331
6.8	Raudfjord...	334
6.9	The Woodfjord area...	336
6.9.1	Woodfjord...	353
6.9.2	Reinsdyrflya, Stasjonsøyane, Andøyane...	355
6.9.3	Liefdefjord...	357
6.9.4	Bockfjord...	360
6.10	Moffen...	361
6.11	Wijdefjord...	363
6.12	Ny Friesland, Verlegenuken...	365
6.13	Sorgfjord...	367
6.14	Hinlopenstretet...	369
6.14.1	Murchisonfjord...	373
6.14.2	Lomfjord...	374
6.14.3	Alkefjellet...	375
6.14.4	Wahlenbergfjord, Palanderbukta...	376
	Footnote one: Drift ice and circumnavigations...	378
	Footnote two: Through Hinlopenstretet or around Nordaustland?...	379
6.14.5	The islands in Hinlopenstretet...	380
6.14.6	Augustabukta, Vibebukta...	383
6.15	Nordaustland...	384
6.15.1	Lady Franklinfjord, Brennevinsfjord, Lågøya...	390
6.15.2	Sjuøyane...	393

6.15.3 Nordenskiöldbukta, Rijpfjord, Duvefjord...	395
6.15.4 Karl XII Øya, Brochøya, Foyneøya...	396
6.15.5 Isispynten, Austfonna, Bråsvellbreen...	398
6.16 Storøya, Kvitøya...	400
6.17 Kong Karls Land...	420
6.18 Southeastern Svalbard...	423
6.18.1 Agardhbukta, Dunérbukta, Mohnbukta...	427
6.18.2 Barentsøya...	430
6.18.3 Edgeøya...	433
6.18.4 Tusenøyane, Halvmåneøya, Ryke Yseøyane...	437
6.18.5 Hopen...	440
6.19 Bjørnøya...	446
6.19.1 Southern Bjørnøya: The bird cliffs (Hambergfjellet-Sørhamna)...	468
6.19.2 Western Bjørnøya...	469
6.19.3 Northern Bjørnøya: Bjørnøya Radio...	470
6.19.4 Eastern Bjørnøya: Kvalrossbukta, Russehamna, Miseryfjellet, Tunheim...	472
6.20 Sørkapp Land...	474
6.21 Hornsund...	477
6.21.1 Gåshamna...	480
6.21.2 Hornsundtind, Samarinvågen...	481
6.21.3 Brepollen...	482
6.21.4 Burgerbukta, Gnålodden...	484
6.21.5 Isbjørnhamna...	486
6.22 Dunøyane, Isøyane, Kapp Borthen...	488
6.23 Bellsund...	489
6.23.1 Recherchefjord...	492
6.23.2 Van Keulenfjord...	495
6.23.3 Van Mijenfjord, Akseløya, northern Bellsund...	497
7. Arctic environmental problems and tourism...	504
AECO...	508
Other books written by the same author...	509
Thank you...	510
The author...	512
Norwegian glossary...	513
Geological glossary...	514
Table: Earth history of Svalbard...	519
Literature...	520
Index...	525