

## **COMPARISON OF MAPPING SPECIFICATIONS**

## 3.3 WATER AND MARSH

Green = symbol change, map needs to change. Yellow = symbol change, gets smaller. Blue = symbol change, gets bigger or more frequent.

Pink = ISOM 2017 and ISSprOM differ. Red = symbol different, fix when field checking map. Olive green = not sure about this change in symbol.

**Red text** = recommended annotations to IOF Specifications.

ISOM 2000	ISOM 2017-2 (Adjusted version published January 2019)	ISSOM 1 January 2007	ISSprOM 2019 (valid from 1 January 2020, with errata)
This group includes both open water	This group includes both open water	No introductory text	No introductory text
and special types of vegetation caused	and special types of vegetation caused		
by the presence of water (marsh).	by the presence of water (marsh).		
The classification is important because	The classification is important because		
it indicates the degree of hindrance to	it indicates runnability and provides		
the runner and provide features for	features for map reading and control		
map reading and control points.	points.		
A black line around a water feature	A black line around a water feature		
indicates that it cannot be crossed under normal weather conditions.	indicates that it is uncrossable.		
In dry areas the features listed in this	The features listed in this section may		
section may only contain water in some seasons.	only contain water in some seasons.		
	Marsh symbols are combined with area		
	symbols for openness (yellow) and		
	runnability (green and yellow).		

ISOM 2000	ISOM 2017-2 (Adjusted version	ISSOM 1 January 2007	ISSprOM 2019 (valid from 1 January
	published January 2019)		2020, with errata)
301 Lake	301 Uncrossable body of water (A)	304.1 Impassable body of water	301 Uncrossable body of water (A)
304 Uncrossable river		(forbidden to cross)	
An uncrossable river or canal is drawn		An area of deep water such as a lake,	An area of deep water such as a lake,
with black bank lines. The bank lines are		pond, river or fountain which may	pond, river or fountain which may
broken at a ford.		constitute a danger to the competitor	constitute a danger to the competitor.
		or has forbidden access.	
A black bank line indicates that the	The black bank line emphasises that the	The dark blue colour and the bordering	The dark blue colour and the bordering
feature cannot be crossed.	feature is uncrossable.	black line indicates that the feature	black line indicate that the feature shall
		cannot or shall not be crossed.	not be crossed.
Large areas of water are shown with	Dominant areas of water may be shown		Colour: black (outline), blue 100% or
dot screen. Small areas of water should	with 70% colour. Small areas of water		70% for dominant areas.
be shown with full colour.	and bodies of water that have narrow		
	parts shall always be shown with full		
	colour.		
Min width: between black lines 0.2mm	Minimum width (inside): 0.3 mm.	The minimum dimension is 1 mm <sup>2</sup> .	Minimum width: 0.3 mm
	Minimum area (inside): 0.55 mm x 0.55		Minimum area (inside): 0.5 mm <sup>2</sup>
	mm (footprint 8 m x 8 m).		(footprint 8 m <sup>2</sup> )
	Min area (OM): 0.7mm		
Colour: blue 50% (60 lines/cm), black.	Colour: blue, black.	Colour: blue 100% or 75% (min. 60	Colour: black (outline), blue 100% or
		lines/cm), black.	70% for dominant areas.
		It is forbidden to cross an impassable	[OA Rule 17.2 says competitors shall
		body of water!	not cross a feature drawn with an
		Competitors violating this rule will be disqualified.	Impassable body of water symbol.]
Black line width: 0.18mm	Black line width: 0.18mm	Black line width: 0.18mm	Black line width: 0.18mm
DIACK IIIIE WIULII. U. 1811IIII	BidCk lille Width. 0.10111111	Diack line width. 0.10111111	Black line width: 0.18mm

302 Pond	302 Shallow body of water (A)	305.1 Passable body of water	302 Crossable body of water (A)
		An area of shallow water such as a	An area of shallow water such as a
		pond, river or fountain that can be	pond, river or fountain that can be
		crossed.	crossed.
		The body of water shall be less than 0.5	The body of water should be less than
		m deep and runnable. If the body of	0.5 m deep and runnable. If the body of
		water is not runnable it shall be	water is not runnable it shall be
		represented with the symbol	represented with the symbol
		impassable body of water (304.1).	Uncrossable body of water (301).
		If no other line symbol touches the	If no other line symbol touches the
		border of the passable body of water,	border of the passable body of water,
		the border shall be represented with a	the border shall be represented with a
		blue line.	blue line.
	A shallow seasonal or periodic body of		
	water may be represented using a		
	dashed outline.		
Where the lake or pond is smaller than			
1mm <sup>2</sup> on the printed map, the bank line			
is omitted.	Small shallow water bodies may be		
	represented as 100% blue (without an		
	outline).		
	Minimum width (inside): 0.3 mm.		100 (000)
			Minimum width: 0.3 mm (IM) – IM is on
	Minimum area (inside): 0.7 mm x 0.7		the drawing, but not the text
	mm (footprint 10.5 m x 10.5 m).		Minimum area (inside): 0.5 mm <sup>2</sup> (footprint 8 m <sup>2</sup> )
	Minimum width (full colour): 0.3 mm.		(tootprint 8 iii )
	Minimum area (full colour): 0.55 mm x 0.55 mm (footprint 8 m x 8 m).		
	Min diameter (full colour) 0.7mm –		
	according to the drawing; this is		
	different to the text above.		
	Colour: blue (outline), blue 50%.		
Colour: blue.	Colour. Blue (outilite), blue 50%.	Colour: blue 30% (min. 60 lines/cm),	Colour: blue (outline), blue 30%.
Colour. blue.	Blue line width: 0.10mm	blue.	colour side (oddine), side 50/0.
	Dash length: 1.25mm	Blue line width: 0.18mm	Blue line width: 0.18mm
	Gap between dashes: 0.25mm	2.20 mg Water 0.20mm	2.30 m.c Watin O.20mm

ISOM 2000	ISOM 2017-2 (Adjusted version published January 2019)	ISSOM 1 January 2007	ISSprOM 2019 (valid from 1 January 2020, with errata)
303 Waterhole	303 Waterhole (P)	303 Waterhole	303 Waterhole (P)
A water-filled pit or an area of water	A water-filled pit or an area of water	A water-filled pit or an area of water	A water-filled pit or an area of water
which is too small to be shown to scale.	which is too small to be shown to scale.	which is too small to be shown to scale.	which is too small to be shown to scale.
Location is the centre of gravity of the	Location is the centre of gravity of the	The symbol is orientated to north.	Location is the centre of gravity of the
symbol, which is orientated to north.	symbol, and the symbol is orientated to north.		symbol, and the symbol is orientated to north.
	Footprint: 10.5 m x 12 m.		Footprint: 4.4 m x 5.0 m.
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
Line width: 0.18mm	Line width: 0.18mm	Line width: 0.25mm	Line width: 0.25mm
Horizontal width (top of V): 0.7mm	Horizontal width (top of V): 0.7mm (OM)	Horizontal width (top of V): 0.82mm (OM)	Horizontal width (top of V): 1.1mm (OM)
Height: 0.8mm	Height: 0.8mm (OM)	Height: 1.25mm (OM)	Height: 1.25mm (OM)
305 Crossable watercourse	304 Crossable watercourse (L)	[Show to scale using passable water	[Show to scale using crossable water
A crossable watercourse, minimum 2 m	Should be at least 2 m wide.	symbol.]	symbol.]
wide.			
The width of watercourses over 5 m			
wide should be shown to scale.			
	Minimum length (isolated): 1 mm (footprint 15 m).		
Colour: blue.	Colour: blue.		
Line width: min 0.25mm	Line width: <mark>0.30mm</mark>		
306 Crossable small watercourse	305 Small crossable watercourse (L)	306 Passable small watercourse	305 Small crossable watercourse (L)
A crossable watercourse (including a	_	A crossable watercourse less than 2 m	A crossable watercourse less than 2 m
major drainage ditch) less than 2 m		wide.	wide.
wide.			
For better legibility a ditch in a marsh			
should be drawn as a crossable			
watercourse (305).			
	Minimum length (isolated): 1 mm (footprint 15 m)		Minimum length: 1 mm (footprint 4 m)
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
Line width: 0.14mm	Line width: 0.18mm	Line width: 0.21mm	Line width: 0.21mm

ISOM 2000	ISOM 2017-2 (Adjusted version published January 2019)	ISSOM 1 January 2007	ISSprOM 2019 (valid from 1 January 2020, with errata)
307 Minor water channel	306 Minor/seasonal water channel (L)	307 Minor watercourse	306 Minor / seasonal watercourse (L)
A natural or man-made minor water	A natural or man-made minor water	A natural or man-made minor	A natural or man-made minor
channel which may contain water only	channel which may contain water only	watercourse which may contain water	watercourse which may contain water
intermittently.	intermittently.	only intermittently.	only intermittently.
	Minimum length (isolated): two dashes		Minimum length (isolated): two dashes
	(2.75 mm - footprint 41 m).		(4.11 mm - footprint 16.5 m)
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
Line width: 0.14mm	Line width: 0.18mm	Line width: 0.21mm	Line width: 0.21mm
Dash length: 1.25mm	Dash length: 1.25mm	Dash length: 1.87mm	Dash length: 1.87mm
Gaps between dashes: 0.25mm	Gaps between dashes: 0.25mm	Gaps between dashes: 0.37mm	Gaps between dashes: 0.37mm
309 Uncrossable marsh	307 Uncrossable marsh (A)	309 Impassable marsh (forbidden to cross)	307 Uncrossable marsh (A)
A marsh which is uncrossable or	A marsh which is uncrossable or	A marsh which is impassable or which	A marsh which is uncrossable or which
dangerous for the runner.	dangerous for the competitor.	may constitute a danger to the	may constitute a danger to the
		competitor.	competitor.
A black line surrounds the symbol.	The black outline emphasises that the	The feature cannot or shall not be	The feature cannot be crossed. [OA
	feature is uncrossable.	crossed. It is forbidden to cross an	Rule 17.2 says competitors shall not
	The black outline is omitted for	impassable marsh! Competitors	cross a feature drawn with an
	boundaries between uncrossable marsh	violating this rule will be disqualified.	Uncrossable marsh symbol.]
	and symbol Uncrossable body of water		
	(301).		
	The symbol may be combined with a		
	rough open land symbol (403, 404) to		
	show openness.		
			At least two blue lines shall be clearly
			visible. Minimum height: 2 lines.
	The symbol is orientated to north.		The symbol is orientated to north.
	Minimum width: 0.3 mm (inside).		
	Minimum area: 0.5 mm² (inside).		
	Min size: 0.8mm (OM)		
Colour: blue, black.	Colour: black (outline), blue.	Colour: blue, black.	Colour: black (outline), blue.
Blue line width: 0.25mm	Blue line width: 0.25mm	Blue line width: 0.25mm	Blue line width: 0.25mm
Gap between blue lines: 0.25mm	Gap between blue lines: 0.25mm	Gap between blue lines: 0.25mm	Gap between blue lines: 0.25mm

ISOM 2000	ISOM 2017-2 (Adjusted version published January 2019)	ISSOM 1 January 2007	ISSprOM 2019 (valid from 1 January 2020, with errata)
Black line width: 0.18mm	Black line width: 0.18mm	Black line width: 0.18mm	Black line width: 0.18mm
310 Marsh	308 Marsh (A)	310 Marsh	308 Marsh (A)
A crossable marsh, usually with a	A crossable marsh, usually with a	A crossable marsh, usually with a	A crossable marsh, usually with a
distinct edge.	distinct edge.	distinct edge.	distinct edge.
The symbol should be combined with	The symbol shall be combined with	The symbol shall be combined with	The symbol shall be combined with
vegetation symbols to show runnability and openness. Where a small marsh area should be combined with either 403/404 it is permitted to use 401/402 to improve legibility.	other symbols to show runnability and openness.	vegetation symbols to show runnability and openness.	vegetation symbols to show runnability and openness.
	The symbol is orientated to north.		The symbol is orientated to north.
Min: 2 lines 0.5mm [long?]	Minimum area: 0.5 mm x 0.4 mm (two lines (footprint 7.5 m x 6 m). Min: 2 lines	Min: 2 lines 0.5mm long	At least two blue lines shall be clearly visible. Minimum height: 2 lines.
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
Line width: 0.1mm	Line width: 0.1mm	Line width: 0.1mm	Line width: 0.12mm
Distance from line to line: 0.3 mm	Distance from line to line: 0.3mm	Distance from line to line: 0.3mm (CC)	Distance from line to line: 0.38mm
308 Narrow marsh	309 Narrow marsh (L)	308 Narrow marsh	309 Narrow marsh (L)
A marsh or trickle of water which is too	A marsh or trickle of water which is too	A marsh or trickle of water which is too	A marsh or trickle of water which is too
narrow to be shown with symbol 310	narrow (less than about 5 m wide) to be	narrow to be shown with symbol marsh	narrow to be shown with symbol Marsh
(less than ca. 5 m wide).	shown with the marsh symbol.	(310).	(310).
	Minimum length (isolated): two dots (0.7 mm - footprint 10.5 m).		Minimum size (isolated): two dots (1 mm - footprint 4 m).
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
Diameter of dots: 0.25mm	Diameter of dots: 0.25mm	Diameter of dots: 0.37mm	Diameter of dots: 0.37mm
Gap between dots: 0.5mm	Gap between dots: 0.45mm	Gap between dots: 0.6mm	Gap between dots: 0.6mm (CC)

ISOM 2000	ISOM 2017-2 (Adjusted version published January 2019)	ISSOM 1 January 2007	ISSprOM 2019 (valid from 1 January 2020, with errata)
311 Indistinct marsh	310 Indistinct marsh (A)	311 Indistinct marsh	310 Indistinct marsh (A)
An indistinct or seasonal marsh or area	An indistinct marsh, seasonal marsh or	An indistinct or seasonal marsh or area	An indistinct or seasonal marsh or area
of gradual transition from marsh to firm	an area of gradual transition from	of gradual transition from marsh to firm	of gradual transition from marsh to firm
ground, which is crossable. The edge is	marsh to firm ground, which is	ground, which is crossable. The edge is	ground, which is crossable. The edge is
generally indistinct and the vegetation	crossable. The edge is generally	generally indistinct and the vegetation	generally indistinct and the vegetation
similar to that of the surrounding	indistinct and the vegetation similar to	similar to that of the surrounding	similar to that of the surrounding
ground. The symbol should be	that of the surrounding ground.	ground. The symbol shall be combined	ground. The symbol shall be combined
combined with vegetation symbols to	The symbol shall be combined with	with vegetation symbols to show	with vegetation symbols to show
show runnability and openness.	other symbols to show runnability and	runnability and openness.	runnability and openness.
	openness.		
	The symbol is orientated to north.		The symbol is orientated to north.
Picture shows at least 3 lines.	Picture shows at least 3 lines. Minimum	Picture shows at least 3 lines.	At least three blue lines shall be clearly
	area: 2.0 mm x 0.7 mm (footprint 30 m		visible.
	x 10.5 m).		
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
Line width: 0.1mm	Line width: 0.1mm	Line width: 0.1mm	Line width: 0.12mm
Distance from line to line: 0.3mm	Distance from line to line: 0.3mm (CC)	Distance from line to line: 0.3mm	Distance from line to line: 0.38mm
Length of dash: 0.9mm	Length of dash: 0.9mm	Length of dash: 0.9mm	Length of dash: 1.0mm
Gap between dashes: 0.25mm	Gap between dashes: 0.25mm	Gap between dashes: 0.25mm	Gap between dashes: 0.35mm
312 Well	311 Well, fountain or water tank (P)	312 Small fountain or well	311 Small fountain or well (P)
Wells and captive springs, which are	A prominent well, fountain, water tank	Small well or fountain,	Small fountain or well
clearly visible on the ground.	or captive spring.	which is at least 1 m high	Minimum height: 0.5 m.
		or at least 1 m in diameter.	which is at least 1 m in diameter.
	Footprint: 12 m x 12 m.		Footprint: 3.6 m x 3.6 m.
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
Diameter of circle: 0.8mm [outside]	Length of side of square: 0.8mm (OM)	Diameter of circle: 0.95mm [outside]	Length of side of square: 0.9mm (OM)
Line width: 0.18mm	Line width: 0.18mm	Line width: 0.25mm	Line width <mark>: 0.25mm</mark>

ISOM 2000	ISOM 2017-2 (Adjusted version published January 2019)	ISSOM 1 January 2007	ISSprOM 2019 (valid from 1 January 2020, with errata)
313 Spring	312 Spring (P)	313 Spring	312 Spring (P)
The source of a stream with a distinct outflow.	A source of water.	The source of a stream with a distinct outflow.	The source of water with a distinct outflow.
	Location is the centre of gravity of the symbol,		
The symbol is orientated to open	and the symbol is orientated to open	The symbol is orientated to open	The symbol is orientated to open
downstream.	downstream.	downstream.	downstream.
		This symbol should generally not be	
		used in urban areas.	
	Footprint: 13.5 m x 7 m.		Footprint: 4.8 m x 2.4 m.
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
U shape, distance between end of line:	U shape, distance between end of line:	U shape, distance between end of line:	U shape, distance between end of line:
0.8mm [IM]	0.9mm (OM)	0.95mm	1.2mm (OM)
	Height of U: 0.45mm (OM)		Height of U: 0.6mm (OM)
Line width: 0.18mm	Line width: 0.18mm	Line width: 0.25mm	Line width: 0.25mm
314 Special water feature	313 Prominent water feature (P)	314 Prominent water feature	313 Prominent water feature (P)
A special small water feature.		A small water feature which is	A small water feature which is
		significant or prominent.	significant or prominent.
	The symbol is orientated to north.	The symbol is orientated to north.	The symbol is orientated to north.
The definition of the symbol must	The definition of the symbol must be	The definition of the symbol shall	The definition of the symbol must be
always be given in the map legend.	given on the map.	always be given in the map legend.	given on the map.
	Footprint: 13.5 m x 13.5 m.		Footprint: 4.8 m in diameter.
Colour: blue.	Colour: blue.	Colour: blue.	Colour: blue.
X shape: 0.8mm high	5 pointed asterisk: 0.9mm high and wide	X shape: 1.2mm high	5 pointed asterisk: 1.2mm high and wide
Line width: 0.18mm	Line width: 0.16mm	Line width: 0.25mm	Line width: 0.25mm