



The National Marine Biological
Analytical Quality Control Scheme
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Fish Reverse Ring Test Bulletin

F-RRT05

2013/2014 (Year 20)

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Thomson Unicomarine Ltd.
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Table 1. Summary of data and specimens received from participating laboratories for the fifth reverse ring test - FRRT_05.

Species Submitted	Number of Specimens	Number of Taxonomic Errors	Size Range (Min - Max; mm)	Thomson Unicmarine References
<i>Lampetra fluviatilis</i> ; River Lamprey	1	0	119	Maitland & Herdson 2009
<i>Raja clavata</i> ; Thornback Ray	1	0	152	Wheeler 1969
<i>Anguilla anguilla</i> ; European Eel	2	0	75 - 275	Maitland & Herdson 2009
<i>Alosa fallax</i> ; Twaite Shad	1	1	54	Wheeler 1969
<i>Clupea harengus</i> ; Herring	15	0	68 - 148	Maitland & Herdson 2009
<i>Sardinia pilchardus</i> ; Pilchard	1	0	84	Maitland & Herdson 2009
<i>Sprattus sprattus</i> ; Sprat	10	1	45 - 115	Maitland & Herdson 2009
<i>Blicca bjoerkna</i> ; Silver Bream	1	0	128	Maitland & Herdson 2009
<i>Abramis brama</i> ; Common Bream	1	0	84 - 110	Maitland & Herdson 2009
<i>Gobio gobio</i> ; Gudgeon	1	1	85	Maitland & Herdson 2009
<i>Leuciscus cephalus</i> ; Chub	1	0	230	Maitland & Herdson 2009
<i>Leuciscus leuciscus</i> ; Dace	3	0	60 - 90	Maitland & Herdson 2009
<i>Phoxinus phoxinus</i> ; Minnow	1	0	80	Maitland & Herdson 2009
<i>Rutilus rutilus</i> ; Roach	2	0	35 - 185	Maitland & Herdson 2009
<i>Osmerus eperlanus</i> ; Smelt	2	0	95 - 220	Wheeler 1969
<i>Coregonus autumnalis</i> ; Pollan	1	0	85	Maitland & Herdson 2009

Table 1. Summary of data and specimens received from participating laboratories for the fifth reverse ring test - FRRT_05.

Species Submitted	Number of Specimens	Number of Taxonomic Errors	Size Range (Min - Max; mm)	Thomson Unicmarine References
<i>Salmo salar</i> ; Atlantic Salmon	1	0	108	Maitland & Herdson 2009
<i>Salmo trutta</i> ; Brown Trout	2	0	99 - 195	Maitland & Herdson 2009
<i>Ciliata mustela</i> ; Five-bearded Rockling	7	1	65 - 185	Maitland & Herdson 2009
<i>Ciliata septentrionalis</i> ; Northern Rockling	1	0	85	Maitland & Herdson 2009
<i>Gadus morhua</i> ; Cod	8	0	67 - 169	Wheeler 1969
<i>Merlangius merlangus</i> ; Whiting	13	0	72 - 286	Wheeler 1969
<i>Micromesistius poutassou</i> ; Blue Whiting	1	0	156	Maitland & Herdson 2009
<i>Pollachius pollachius</i> ; Pollack	3	0	124 - 180	Wheeler 1969
<i>Trisopterus luscus</i> ; Bib / Pouting	7	0	114 - 180	Wheeler 1969
<i>Trisopterus minutus</i> ; Poor Cod	3	0	79 - 80	Wheeler 1969
<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	4	3	27 - 114	Wheeler 1969
<i>Liza aurata</i> ; Golden Grey Mullet	2	2	46 - 93	Wheeler 1969
<i>Liza ramda</i> ; Thin-lipped Grey Mullet	5	1	47 - 276	Wheeler 1969
<i>Atherina presbyter</i> ; Sand Smelt	10	0	50 - 147	Maitland & Herdson 2009

Table 1. Summary of data and specimens received from participating laboratories for the fifth reverse ring test - FRRT_05.

Species Submitted	Number of Specimens	Number of Taxonomic Errors	Size Range (Min - Max; mm)	Thomson Unicomarine References
<i>Gasterosteus aculeatus</i> ; Three-spined Stickleback	2	0	33 - 47	Maitland & Herdson 2009
<i>Spinachia spinachia</i> ; Fifteen-spined Stickleback	6	0	76 - 110	Maitland & Herdson 2009
<i>Entelurus aequoreus</i> ; Snake Pipefish	2	1	84 - 466	Wheeler 1969
<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	14	0	45 - 170	Wheeler 1969
<i>Nerophis lumbriciformis</i> ; Worm Pipefish	1	0	55	Wheeler 1969
<i>Syngnathus acus</i> ; Greater Pipefish	5	4	64 - 315	Wheeler 1969
<i>Trigloporus lastoviza</i> ; Streaked Gurnard	1	0	276	Maitland & Herdson 2009
<i>Chelidonichthys cuculus</i> ; Red Gurnard	2	0	183 - 224	Wheeler 1969
<i>Chelidonichthys lucernus</i> ; Tub Gurnard	2	0	55 - 134	Wheeler 1969
<i>Eutrigla gurnardus</i> ; Grey Gurnard	1	0	87	Maitland & Herdson 2009
<i>Eutrigla gurnardus</i> ; Grey Gurnard / <i>Chelidonichthys lucernus</i> ; Tub Gurnard	1	1	68 - 87	Wheeler 1969
<i>Myoxocephalus scorpius</i> ; Bull Rout	4	0	69 - 150	Maitland & Herdson 2009
<i>Taurulus bubalis</i> ; Long-spined Sea Scorpion	2	0	70 - 89	Maitland & Herdson 2009

Table 1. Summary of data and specimens received from participating laboratories for the fifth reverse ring test - FRRT_05.

Species Submitted	Number of Specimens	Number of Taxonomic Errors	Size Range (Min - Max; mm)	Thomson Unicmarine References
<i>Agonus cataphractus</i> ; Pogge / Hooknose	8	0	46 - 112	Maitland & Herdson 2009
<i>Cyclopterus lumpus</i> ; Lump sucker	1	0	52	Maitland & Herdson 2009
<i>Liparis liparis</i> ; Common Seasnail	2	0	71 - 114	Maitland & Herdson 2009
<i>Liparis montagui</i> ; Montagu's Seasnail	1	0	57	Maitland & Herdson 2009
<i>Dicentrarchus labrax</i> ; Sea Bass	9	0	33 - 175	Maitland & Herdson 2009
<i>Perca fluviatilis</i> ; Perch	1	0	205	Maitland & Herdson 2009
<i>Sander lucioperca</i> ; Zander	2	0	155 - 159	Maitland & Herdson 2009
<i>Trachurus trachurus</i> ; Scad / Atlantic Horse Mackerel	4	0	35 - 58	Maitland & Herdson 2009
<i>Spondyliosoma cantharus</i> ; Black Bream	2	0	55 - 66	Maitland & Herdson 2009
<i>Dentex maroccanus</i> ; Morocco Dentex	1	0	31	Wheeler 1969
<i>Mullus surmuletus</i> ; Red / Red Striped Mullet	4	0	50 - 77	Wheeler 1969
<i>Symphodus melops</i> ; Corkwing Wrasse	6	0	41 - 75	Lythgoe & Lythgoe 1992
<i>Ctenolabrus rupestris</i> ; Goldsinny	1	0	48	Maitland & Herdson 2009
<i>Labrus bergylta</i> ; Ballan Wrasse	2	0	54 - 75	Lythgoe & Lythgoe 1991

Table 1. Summary of data and specimens received from participating laboratories for the fifth reverse ring test - FRRT_05.

Species Submitted	Number of Specimens	Number of Taxonomic Errors	Size Range (Min - Max; mm)	Thomson Unicomarine References
<i>Zoarces viviparus</i> ; Viviparous Blenny	3	0	128 - 158	Maitland & Herdson 2009
<i>Pholis gunnellus</i> ; Butterfish	1	0	115	Maitland & Herdson 2009
<i>Ammodytes tobianus</i> ; Lesser Sandeel	5	0	101 - 145	Wheeler 1969
<i>Hyperoplus lanceolatus</i> ; Greater Sandeel	2	1	103 - 185	Wheeler 1969
Unidentified Sandeel	1	1	114 - 117	Wheeler 1969
<i>Echiichthys vipera</i> ; Lesser Weever	4	0	81 - 130	Maitland & Herdson 2009
<i>Lumpenus lampretaeformis</i> ; Snake Blenny	1	0	107	Maitland & Herdson 2009
<i>Lipophrys pholis</i> ; Shanny	2	0	80 - 91	Maitland & Herdson 2009
<i>Parablennius gattorugine</i> ; Tompot Blenny	1	0	42	Wheeler 1969
<i>Callionymus lyra</i> ; Common Dragonet	4	0	86 - 166	Maitland & Herdson 2009
<i>Callionymus maculatus</i> ; Spotted Dragonet	2	0	105 - 116	Maitland & Herdson 2009
<i>Callionymus reticulatus</i> ; Reticulated Dragonet	1	1	137	Maitland & Herdson 2009
<i>Aphia minuta</i> ; Transparent Goby	2	0	30 - 45	Lythgoe & Lythgoe 1991
<i>Gobius niger</i> ; Black Goby	7	1	25 - 104	Lythgoe & Lythgoe 1991
<i>Gobius paganellus</i> ; Rock Goby	3	0	40 - 65	Lythgoe & Lythgoe 1991

Table 1. Summary of data and specimens received from participating laboratories for the fifth reverse ring test - FRRT_05.

Species Submitted	Number of Specimens	Number of Taxonomic Errors	Size Range (Min - Max; mm)	Thomson Unicomarine References
<i>Gobiusculus flavescens</i> ; Two-spotted Goby	4	0	30 - 53	Lythgoe & Lythgoe 1991
<i>Lesuerigobius friesii</i> ; Fries's Goby	1	0	94	Lythgoe & Lythgoe 1991
<i>Pomatoschistus microps</i> ; Common Goby	8	4	30 - 47	Lythgoe & Lythgoe 1991
<i>Pomatoschistus minutus</i> ; Sand Goby	12	1	29 - 80	Lythgoe & Lythgoe 1991
<i>Pomatoschistus pictus</i> ; Painted Goby	2	0	47	Lythgoe & Lythgoe 1991
Unidentified Goby	2	2	32 - 38	Lythgoe & Lythgoe 1991
<i>Scomber scombrus</i> ; Atlantic Mackerel	1	0	267	Maitland & Herdson 2009
<i>Scophthalmus maximus</i> ; Turbot	1	0	53	Maitland & Herdson 2009
<i>Zeugopterus punctatus</i> ; Topknot	1	0	73	Maitland & Herdson 2009
<i>Glyptocephalus cynoglossus</i> ; Witch	1	0	342	Maitland & Herdson 2009
<i>Hippoglossoides platessoides</i> ; Long Rough Dab	2	0	99 - 123	Maitland & Herdson 2009
<i>Limanda limanda</i> ; Dab	7	0	40 - 245	Maitland & Herdson 2009
<i>Microstomus kitt</i> ; Lemon Sole	1	0	191	Maitland & Herdson 2009
<i>Platichthys flesus</i> ; Flounder	14	2	28 - 175	Wheeler 1969

Table 1. Summary of data and specimens received from participating laboratories for the fifth reverse ring test - FRRT_05.

Species Submitted	Number of Specimens	Number of Taxonomic Errors	Size Range (Min - Max; mm)	Thomson Unicomarine References
<i>Pleuronectes platessa</i> ; Plaice	15	1	10 - 154	Wheeler 1969
<i>Arnoglossis laterna</i> ; Scaldfish	2	0	91 - 123	Wheeler 1969
<i>Buglossidium luteum</i> ; Solenette	5	0	35 - 115	Maitland & Herdson 2009
<i>Microchirus variegatus</i> ; Thickback Sole	1	0	124	Maitland & Herdson 2009
<i>Solea solea</i> ; Common Sole	4	0	66 - 175	Maitland & Herdson 2009

Table 2. Summary of taxonomic errors by participating laboratories for the fifth fish reverse ring test; FRRT_05, sorted by taxonomic group.

Total Number of Entries - 320

Total Number of Taxonomic Errors - 30

LabCode	Laboratory Identification	Thomson Unicmarine Identification	Reason for Taxonomic Error (TE)
2014	<i>Alosa sp.</i> ; Shad species	<i>Alosa fallax</i> ; Twaite Shad	TE - Gill rakers stout rather than feathery. 35 - 60 gill rakers on first gill arch
2064	<i>Sprattus sprattus</i> ; Sprat	<i>Clupea harengus</i> ; Herring	TE - Dorsal fin origin positioned in front of the pelvic fin origin, 13 - 16 scales between the pelvic fin base and vent
2027	<i>Gobio gobio</i> ; Common Gudgeon	<i>Barbatula barbatula</i> ; Stone Loach	TE - 6 barbels around the mouth, caudal fin truncated
2042	<i>Ciliata mustela</i> ; Five-bearded Rockling	<i>Ciliata septentrionalis</i> ; Northern Rockling	TE - Lobes along the folds of skin above the upper jaw
2011	<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	<i>Liza ramada</i> ; Thin-lipped Grey Mullet	TE - Upper lip less than half the eye diameter, papillae on lip absent
2070	<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	<i>Liza aurata</i> ; Golden Grey Mullet	TE - Ventral head pigmentation
2070	<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	<i>Liza aurata</i> ; Golden Grey Mullet	TE - Ventral head pigmentation
2012	<i>Liza aurata</i> ; Golden Grey Mullet	<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	TE - Ventral head pigmentation
2063	<i>Liza aurata</i> ; Golden Grey Mullet	<i>Liza ramada</i> ; Thin-lipped Grey Mullet	TE - Pectoral fin does not extend to or beyond the eye
2006	<i>Liza ramada</i> ; Thin-lipped Mullet	<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	TE - Ventral head pigmentation
2006	<i>Entelurus aequoreus</i> ; Snake Pipefish	<i>Syngnathus acus</i> ; Greater Pipefish	TE - Dorsal fin covers 9 body rings, tail fin not tiny
2006	<i>Syngnathus acus</i> ; Greater Pipefish	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	TE - Dorsal fin covers 12 body rings
2039	<i>Syngnathus acus</i> ; Greater Pipefish	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	TE - Dorsal fin covers 12 body rings
2063	<i>Syngnathus acus</i> ; Greater Pipefish	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	TE - Dorsal fin covers 12 body rings
2064	<i>Syngnathus acus</i> ; Greater Pipefish	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	TE - Dorsal fin covers 12 body rings

Table 2. Summary of taxonomic errors by participating laboratories for the fifth fish reverse ring test; FRRT_05, sorted by taxonomic group.

LabCode	Laboratory Identification	Thomson Unicornarine Identification	Reason for Taxonomic Error (TE)
2065	<i>Eutrigla gurnardus</i> ; Grey Gurnard / <i>Chelidonichthys lucerna</i> ; Tub Gurnard	<i>Chelidonichthys lucerna</i> ; Tub Gurnard	TE - Pectoral fins reach past the vent, no dusky blotch on the 1st dorsal fin
2041	<i>Hyperoplus lanceolatus</i> ; Greater Sandeel	<i>Hyperoplus immaculatus</i> ; Corbin's Sandeel	TE - Upper jaw uniformly dark, absence of dark patch on snout
2042	Unknown Sandeel	<i>Ammodytes tobianus</i> ; Lesser Sandeel	TE - Teeth absent in the roof of the mouth, mouth is able to form an extended tube, found inshore
2039	<i>Callionymus reticulatus</i> ; Reticulated Dragonet	<i>Callionymus lyra</i> ; Common Dragonet	TE - 4 spines on preoperculum
2039	<i>Gobius niger</i> ; Black Goby	<i>Gobius paganellus</i> ; Rock Goby <i>Pomatoschistus pictus</i> ; Painted Goby	TE - Front nostril with a tentacle (<i>G. paganellus</i>) TE - No process from anterior nostril, ventral head pigmentation (<i>P. pictus</i>)
2006	<i>Pomatoschistus microps</i> ; Common Goby	<i>Pomatoschistus minutus</i> ; Sand Goby	TE - Ventral head pigmentation, villi present on anterior membrane
2042	<i>Pomatoschistus microps</i> ; Common Goby	<i>Pomatoschistus pictus</i> ; Painted Goby	TE - Ventral head pigmentation
2064	<i>Pomatoschistus microps</i> ; Common Goby	<i>Pomatoschistus minutus</i> ; Sand Goby	TE - Ventral head pigmentation
2069	<i>Pomatoschistus microps</i> ; Common Goby	<i>Pomatoschistus minutus</i> ; Sand Goby	TE - Ventral head pigmentation, villi present on anterior membrane
2069	<i>Pomatoschistus minutus</i> ; Sand Goby	<i>Pomatoschistus microps</i> ; Common Goby	TE - Ventral head pigmentation
2006	Unidentified Goby	<i>Gobius niger</i> ; Black Goby	TE - Flap on anterior nostril, no lobes on anterior membrane
2063	Unidentified Goby	<i>Pomatoschistus minutus</i> ; Sand Goby	TE - Villi present on anterior membrane, ventral head pigmentation
2029	<i>Platichthys flesus</i> ; Flounder	<i>Pleuronectes platessa</i> ; Plaice	TE - No spines present along dorsal and anal fins
2039	<i>Platichthys flesus</i> ; Flounder	<i>Limanda limanda</i> ; Dab	TE - Lateral line curved above the pectoral fin
2029	<i>Pleuronectes platessa</i> ; Plaice	<i>Platichthys flesus</i> ; Flounder	TE - Spines present along dorsal and anal fins

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 25/11/2013

Specimens Received - 26/11/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2006

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Syngnathus acus</i> ; Greater Pipefish; 102	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	TE - Dorsal fin covers 12 body rings
2	<i>Syngnathus rostellatus</i> ; Lesser Pipefish; 91	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
3	<i>Crenilabrus melops</i> ; Corkwing Wrasse; 53	<i>Symphodus melops</i> ; Corkwing Wrasse	sy
4	<i>Entelurus aequoreus</i> ; Snake Pipefish; 84	<i>Syngnathus acus</i> ; Greater Pipefish	TE - Dorsal fin covers 9 body rings, tail fin not tiny
5	<i>Pomatoschistus microps</i> ; Common Goby; 38	<i>Pomatoschistus minutus</i> ; Sand Goby	TE - Ventral head pigmentation, villi present on anterior membrane
6	<i>Pomatoschistus minutus</i> ; Sand Goby; 71	<i>Pomatoschistus minutus</i> ; Sand Goby	-
7	<i>Gobius paganellus</i> ; Rock Goby; 47	<i>Gobius paganellus</i> ; Rock Goby	sp
8	<i>Labrus bergylta</i> ; Ballan Wrasse; 54	<i>Labrus bergylta</i> ; Ballan Wrasse	-
9	<i>Gobiusculus flavescens</i> ; Two spotted Goby; 30	<i>Gobiusculus flavescens</i> ; Two-spotted Goby	-
10	<i>Spondyllosoma cantharus</i> ; Black Sea Bream; 55	<i>Spondyllosoma cantharus</i> ; Black Bream	-
11	<i>Dicentrarchus labrax</i> ; Sea Bass; 71	<i>Dicentrarchus labrax</i> ; Sea Bass	-
12	<i>Liza ramada</i> ; Thin-lipped Grey Mullet; 47	<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	TE - Ventral head pigmentation
13	<i>Clupea harengus</i> ; Herring; 110	<i>Clupea harengus</i> ; Herring	-
14	<i>Sprattus sprattus</i> ; Sprat; 56	<i>Sprattus sprattus</i> ; Sprat	-
15	? ?; unidentified goby;	<i>Gobius niger</i> ; Black Goby	* - Flap on anterior nostril, no lobes on anterior membrane

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 11/12/2013

Specimens Received - 13/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2010

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Buglossidium luteum</i> ; Solenette; 90	<i>Buglossidium luteum</i> ; Solenette	-
2	<i>Pholis gunnellus</i> ; Butterfish; 115	<i>Pholis gunnellus</i> ; Butterfish	-
3	<i>Osmerus eperlanus</i> ; Smelt; 220	<i>Osmerus eperlanus</i> ; Smelt	-
4	<i>Cyclopterus lumpus</i> ; Lump sucker; 52	<i>Cyclopterus lumpus</i> ; Lump sucker	-
5	<i>Ciliata mustela</i> ; 5-bearded rockling; 143	<i>Ciliata mustela</i> ; Five-bearded Rockling	-
6	<i>Entelurus aequoreus</i> ; Snake pipefish; 466	<i>Entelurus aequoreus</i> ; Snake Pipefish	-
7	<i>Echiichthys vipera</i> ; Lesser Weaver; 130	<i>Echiichthys vipera</i> ; Lesser Weever	-
8	<i>Atherina presbyter</i> ; Sand smelt; 68	<i>Atherina presbyter</i> ; Sand Smelt	-
9	<i>Gasterosteus aculeatus</i> ; 3 spined stickleback; 47	<i>Gasterosteus aculeatus</i> ; Three-spined Stickleback	-
10	<i>Sprattus sprattus</i> ; Sprat; 60	<i>Sprattus sprattus</i> ; Sprat	-
11	<i>Clupea harengus</i> ; herring; 58	<i>Clupea harengus</i> ; Herring	-
12	<i>Platichthys flesus</i> ; Flounder; 79	<i>Platichthys flesus</i> ; Flounder	-
13	<i>Pleuronectes platessa</i> ; Plaice; 57	<i>Pleuronectes platessa</i> ; Plaice	-
14	<i>Syngnathus rostellatus</i> ; Lesser pipefish; 170	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
15	<i>Ammodytes tobianus</i> ; Lesser sandeel; 145	<i>Ammodytes tobianus</i> ; Lesser Sandeel	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
 Return Deadline - 13/12/2013
 Data Received - 05/12/2013
 Specimens Received - 05/12/2013
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2011

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine identification	Code / Comments
1	<i>Pleuronectes platessa</i> ; Plaice; 60	<i>Pleuronectes platessa</i> ; Plaice	-
2	<i>Clupea harengus</i> ; Herring; 91	<i>Clupea harengus</i> ; Herring	-
3	<i>Syngnathus rostellatus</i> ; Lesser (Nilsons) pipefish; 95	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
4	<i>Pomatoschistus minutus</i> ; Sandy goby; 78	<i>Pomatoschistus minutus</i> ; Sandy Goby	-
5	<i>Merlangius merlangus</i> ; Whiteing; 72	<i>Merlangius merlangus</i> ; Whiting	-
6	<i>Chelon labrosus</i> ; Thick Lipped Grey Mullet; 114	<i>Liza ramada</i> ; Thin-lipped Grey Mullet	TE - Upper lip less than half the eye diameter, papillae absent
7	<i>Gadus morhua</i> ; Cod; 120	<i>Gadus morhua</i> ; Cod	-
8	<i>Ammodytes tobianus</i> ; Lesser Sandeel; 101	<i>Ammodytes tobianus</i> ; Lesser Sandeel	-
9	<i>Gasterosteus aculeatus</i> ; 3 Spined Stickleback; 33	<i>Gasterosteus aculeatus</i> ; Three-spined Stickleback	-
10	<i>Salmo trutta</i> ; Brown Trout; 99	<i>Salmo trutta</i> ; Brown Trout	-
11	<i>Agonus cataphractus</i> ; Hooknose / Pogge; 54	<i>Agonus cataphractus</i> ; Pogge / Hooknose	-
12	<i>Salmo trutta</i> ; Sea Trout; 195	<i>Salmo trutta</i> ; Sea Trout	-
13	-	-	No fish submitted
14	-	-	No fish submitted
15	-	-	No fish submitted

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
 Return Deadline - 13/12/2013
 Data Received - 06/11/13
 Specimens Received - 07/11/13
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2012

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicmarine

Specimen No.	Laboratory Id. (Genus species; common name; length in mm)	Thomson Unicmarine Identification	Code / Comments
1	<i>Dicentrarchus labrax</i> ; Sea bass; 76	<i>Dicentrarchus labrax</i> ; Sea Bass	-
2	<i>Agonus cataphractus</i> ; Hook nose; 57	<i>Agonus cataphractus</i> ; Pogge / Hooknose	-
3	<i>Gobius niger</i> ; Black goby; 104	<i>Gobius niger</i> ; Black Goby	-
4	<i>Clupea harengus</i> ; Herring; 56	<i>Clupea harengus</i> ; Herring	-
5	<i>Sardinia pilchardus</i> ; Pilchard; 84	<i>Sardinia pilchardus</i> ; Pilchard	-
6	<i>Sprattus sprattus</i> ; Sprat; 45	<i>Sprattus sprattus</i> ; Sprat	-
7	<i>Pomatoschistus minutus</i> ; Sand goby; 72	<i>Pomatoschistus minutus</i> ; Sand Goby	-
8	<i>Pomatoschistus microps</i> ; Common goby; 46	<i>Pomatoschistus microps</i> ; Common Goby	-
9	<i>Atherina presbyter</i> ; Sand smelt; 80	<i>Atherina presbyter</i> ; Sand Smelt	-
10	<i>Leuciscus leuciscus</i> ; Dace; 60	<i>Leuciscus leuciscus</i> ; Dace	-
11	<i>Echiichthys vipera</i> ; Lesser weaver; 81	<i>Echiichthys vipera</i> ; Lesser Weever	-
12	<i>Pleuronectes platessa</i> ; Plaice; 83	<i>Pleuronectes platessa</i> ; Plaice	-
13	<i>Syngnathus rostellatus</i> ; Nilsson's pipefish; 139	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
14	<i>Liza aurata</i> ; Golden Grey Mullet; 46	<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	TE - Ventral head pigmentation
15	<i>Chelon labrosus</i> ; Thick lipped Mullet; 37	<i>Chelon labrosus</i> ; Thick-lipped Grey Mullet	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 28/11/2013

Specimens Received - 28/11/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2013

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicumarine

Specimen No.	Laboratory Id. (Genus species; common name; length in mm)	Thomson Unicumarine Identification	Code / Comments
1	<i>Gobiusculus flavescens</i> ; Two-spotted goby; 41	<i>Gobiusculus flavescens</i> ; Two-spotted Goby	-
2	<i>Pomatoschistus pictus</i> ; Painted Goby; 47	<i>Pomatoschistus pictus</i> ; Painted Goby	-
3	<i>Spinachia spinachia</i> ; Fifteen-spined stickleback; 76	<i>Spinachia spinachia</i> ; Fifteen-spined Stickleback	-
4	<i>Gobiusculus paganellus</i> ; Rock goby; 40	<i>Gobiusculus paganellus</i> ; Rock Goby	-
5	<i>Parablennius gattorugine</i> ; Tompot blenny; 42	<i>Parablennius gattorugine</i> ; Tompot Blenny	-
6	<i>Mullus surmuletus</i> ; Striped red mullet; 71	<i>Mullus surmuletus</i> ; Red / Red Striped Mullet	-
7	<i>Trachurus trachurus</i> ; Scad; 45	<i>Trachurus trachurus</i> ; Scad / Atlantic Horse Mackerel	-
8	<i>Ciliata mustela</i> ; Five-bearded rockling; 65	<i>Ciliata mustela</i> ; Five-bearded Rockling	-
9	<i>Crenilabrus melops</i> ; Corkwing wrasse; 41	<i>Crenilabrus melops</i> ; Corkwing Wrasse	-
10	<i>Agonus cataphractus</i> ; Hooknose/Pogge; 64	<i>Agonus cataphractus</i> ; Pogge / Hooknose	-
11	<i>Buglossidium luteum</i> ; Solenette; 77	<i>Buglossidium luteum</i> ; Solenette	-
12	<i>Atherina presbyter</i> ; Sand-smelt; 113	<i>Atherina presbyter</i> ; Sand Smelt	-
13	<i>Clupea harengus</i> ; Herring; 138	<i>Clupea harengus</i> ; Herring	-
14	<i>Taurulus bubalis</i> ; Long-spined sea scorpion; 70	<i>Taurulus bubalis</i> ; Long-spined Sea Scorpion	-
15	<i>Syngnathus rostellatus</i> ; Lesser pipefish; 108	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 11/12/2013

Specimens Received - 11/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2014

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Platichthys flesus</i> ; Flounder; 121	<i>Platichthys flesus</i> ; Flounder	-
2	<i>Dicentrarchus labrax</i> ; Sea Bass; 175	<i>Dicentrarchus labrax</i> ; Sea Bass	-
3	<i>Anguilla anguilla</i> ; European Eel; 275	<i>Anguilla anguilla</i> ; European Eel	-
4	<i>Rutilus rutilus</i> ; Roach; 185	<i>Rutilus rutilus</i> ; Roach	-
5	<i>Liza ramada</i> ; Thin-lipped Grey Mullet; 276	<i>Liza ramada</i> ; Thin-lipped Grey Mullet	-
6	<i>Leuciscus cephalus</i> ; Chub; 230	<i>Leuciscus cephalus</i> ; Chub	-
7	<i>Abramis bjoerkna</i> ; Silver Bream; 128	<i>Blicca bjoerkna</i> ; Silver Bream	sy
8	<i>Alosa sp.</i> ; Shad sp.; 56	<i>Alosa fallax</i> ; Twaite Shad	TE - Upper jaw notched in mid-line, gill rakers are stout rather than feathery as seen with Allis shad
9	<i>Sander lucioperca</i> ; Zander; 155	<i>Sander lucioperca</i> ; Zander; 155	-
10	<i>Perca fluviatilis</i> ; Perch; 205	<i>Perca fluviatilis</i> ; Perch; 205	-
11	-	-	No fish submitted
12	-	-	No fish submitted
13	-	-	No fish submitted
14	-	-	No fish submitted
15	-	-	No fish submitted

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 27/11/2013

Specimens Received - 28/11/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2027

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicmarine

Specimen No.	Laboratory Id. (Genus species; common name; length in mm)	Thomson Unicmarine Identification	Code / Comments
1	<i>Clupea harengus</i> ; Herring; 90	<i>Clupea harengus</i> ; Herring	-
2	<i>Platichthys flesus</i> ; Flounder; 30, 28, 38	<i>Platichthys flesus</i> ; Flounder	-
3	<i>Pleuronectes platessa</i> ; Plaice; 31, 34, 39	<i>Pleuronectes platessa</i> ; Plaice	-
4	<i>Coregonus autummalis</i> ; Pollan; 85	<i>Coregonus autummalis</i> ; Pollan	-
5	<i>Anguilla anguilla</i> ; European Eel; 75	<i>Anguilla anguilla</i> ; European Eel	-
6	<i>Ciliata septentrionalis</i> ; Northern Rockling; 85	<i>Ciliata septentrionalis</i> ; Northern Rockling	-
7	<i>Gobiusculus flavescens</i> ; Two-spotted Goby; 53	<i>Gobiusculus flavescens</i> ; Two-spotted Goby	-
8	<i>Salmo salar</i> ; Atlantic Salmon; 108	<i>Salmo salar</i> ; Atlantic Salmon	-
9	<i>Gobio gobio</i> ; Common Gudgeon; 85	<i>Barbatula barbatula</i> ; Stone Loach	TE - 6 barbels around the mouth, caudal fin truncated
10	<i>Pomatoschistus microps</i> ; Common Goby; 30	<i>Pomatoschistus microps</i> ; Common Goby	-
11	<i>Liparis montagui</i> ; Montagu's Seasnail; 57	<i>Liparis montagui</i> ; Montagu's Seasnail	-
12	<i>Eutrigla gurnardus</i> ; Grey gurnard; 87	<i>Eutrigla gurnardus</i> ; Grey Gurnard	-
13	<i>Zeugopterus punctatus</i> ; Topknot; 73	<i>Zeugopterus punctatus</i> ; Topknot	-
14	<i>Rutilus rutilus</i> ; Roach; 35	<i>Rutilus rutilus</i> ; Roach	-
15	<i>Phoxinus phoxinus</i> ; Minnow; 80	<i>Phoxinus phoxinus</i> ; Minnow	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
 Return Deadline - 13/12/2013
 Data Received - 02/12/2013
 Specimens Received - 03/12/2013
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2028

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine identification	Code / Comments
1	<i>Psetta maxima</i> ; Turbot; 53	<i>Scophthalmus maximus</i> ; Turbot	sy
2	<i>Pleuronectes platessa</i> ; Plaice; 59	<i>Pleuronectes platessa</i> ; Plaice	-
3	<i>Limanda limanda</i> ; Dab; 50	<i>Limanda limanda</i> ; Dab	-
4	<i>Syngnathus rostellatus</i> ; Lesser Pipefish; 122	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
5	<i>Dicentrarchus labrax</i> ; Sea Bass; 37	<i>Dicentrarchus labrax</i> ; Sea Bass	-
6	<i>Pomatoschistus minutus</i> ; Sand Goby; 56	<i>Pomatoschistus minutus</i> ; Sand Goby	-
7	<i>Solea solea</i> ; Common Sole; 66	<i>Solea solea</i> ; Common Sole	-
8	<i>Gadus morhua</i> ; Cod; 67	<i>Gadus morhua</i> ; Cod	-
9	<i>Ciliata mustela</i> ; Five Bearded Rockling; 85	<i>Ciliata mustela</i> ; Five-bearded Rockling	-
10	<i>Pomatoschistus microps</i> ; Common Goby; 39	<i>Pomatoschistus microps</i> ; Common Goby	-
11	<i>Spinachia spinachia</i> ; Fifteen Spined Stickleback; 78	<i>Spinachia spinachia</i> ; Fifteen-spined Stickleback	-
12	<i>Platichthys flesus</i> ; Flounder; 42	<i>Platichthys flesus</i> ; Flounder	-
13	<i>Clupea harengus</i> ; Herring; 78	<i>Clupea harengus</i> ; Herring	-
14	<i>Ammodytes tobianus</i> ; Lesser Sandeel; 135	<i>Ammodytes tobianus</i> ; Lesser Sandeel	-
15	-	-	No fish submitted

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 16/12/2013

Specimens Received - 16/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2029

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Platichthys flesus</i> ; Flounder; 38, 35, 29, 28	<i>Pleuronectes platessa</i> ; Plaice	TE - No spines present along dorsal and anal fins
2	<i>Atherina presbyter</i> ; Sand Smelt; 105	<i>Atherina presbyter</i> ; Sand Smelt	-
3	<i>Pleuronectes platessa</i> ; Plaice; 25, 23, 18, 28	<i>Platichthys flesus</i> ; Flounder	TE - Spines present along dorsal and anal fins
4	<i>Merlangius merlangus</i> ; Whiting; 115	<i>Merlangius merlangus</i> ; Whiting	-
5	<i>Spinachia spinachia</i> ; Fifteen-spined stickleback; 99	<i>Spinachia spinachia</i> ; Fifteen-spined Stickleback	-
6	<i>Lumpenis lampetae</i> ; Snake blenny; 107	<i>Lumpenus lampretaeformis</i> ; Snake Blenny	sp
7	<i>Gadus morhua</i> ; Cod; 93	<i>Gadus morhua</i> ; Cod	-
8	<i>Syngnathus rostellatus</i> ; Lesser Pipefish; 141	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	sp
9	<i>Lesueurigobius friesii</i> ; Fries's Goby; 94	<i>Lesueurigobius friesii</i> ; Fries's Goby	sp
10	<i>Gobius niger</i> ; Black Goby; 97	<i>Gobius niger</i> ; Black Goby	-
11	<i>Buglossidium luteum</i> ; Solenette; 98	<i>Buglossidium luteum</i> ; Solenette	-
12	<i>Hippoglossoides platessoides</i> ; Long Rough Dab; 99	<i>Hippoglossoides platessoides</i> ; Long Rough Dab	-
13	<i>Myoxocephalus scorpius</i> ; Bull Rout; 78	<i>Myoxocephalus scorpius</i> ; Bull Rout	-
14	<i>Tarrulus bubalis</i> ; Long-spined Sea Scorpion; 89	<i>Taurulus bubalis</i> ; Long-spined Sea Scorpion	sp
15	<i>Callionymus maculatus</i> ; Spotted Dragonet; 116	<i>Callionymus maculatus</i> ; Spotted Dragonet	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 09/01/2014

Specimens Received - 11/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2037

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Zoarces viviparus</i> ; Viviparous blenny; 140	<i>Zoarces viviparus</i> ; Viviparous Blenny	-
2	<i>Gadus morhua</i> ; Cod; 153	<i>Gadus morhua</i> ; Cod	-
3	<i>Ciliata mustela</i> ; Five bearded rockling; 176	<i>Ciliata mustela</i> ; Five-bearded Rockling	-
4	<i>Pleuronectes platessa</i> ; Plaice; 154	<i>Pleuronectes platessa</i> ; Plaice	-
5	<i>Limanda limanda</i> ; Dab; 245	<i>Limanda limanda</i> ; Dab	-
6	<i>Gobius niger</i> ; Black goby; 98	<i>Gobius niger</i> ; Black Goby	-
7	<i>Callionymus lyra</i> ; Common dragonet; 166	<i>Callionymus lyra</i> ; Common Dragonet	-
8	<i>Merlangius merlangus</i> ; Whiting; 193	<i>Merlangius merlangus</i> ; Whiting	-
9	<i>Solea solea</i> ; Common Sole; 155	<i>Solea solea</i> ; Common Sole	-
10	<i>Raja clavata</i> ; Thornback Ray; 152	<i>Raja clavata</i> ; Thornback Ray	-
11	<i>Trisopterus luscus</i> ; Bib; 195	<i>Trisopterus luscus</i> ; Bib / Pouting	-
12	<i>Liparis liparis</i> ; Common seasnail; 114	<i>Liparis liparis</i> ; Common Seasnail	-
13	<i>Syngnathus rostellatus</i> ; Lesser pipefish; 122	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
14	<i>Agonus cataphractus</i> ; Pogge (hooknose); 95	<i>Agonus cataphractus</i> ; Pogge / Hooknose	-
15	<i>Myoxocephalus scorpius</i> ; Bull rout; 150	<i>Myoxocephalus scorpius</i> ; Bull Rout	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 11/12/2013

Specimens Received - 11/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2038

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Solea solea</i> ; Dover Sole Common; 168	<i>Solea solea</i> ; Common Sole	-
2	<i>Limanda limanda</i> ; Dab; 142	<i>Limanda limanda</i> ; Dab	-
3	<i>Merlangius merlangus</i> ; Whiting; 191	<i>Merlangius merlangus</i> ; Whiting	-
4	<i>Godus morhua</i> ; Cod; 168	<i>Gadus morhua</i> ; Cod	-
5	<i>Ciliata mustela</i> ; Five-bearded Rockling; 146	<i>Ciliata mustela</i> ; Five-bearded Rockling	-
6	<i>Zoarces viviparus</i> ; Viviparous Blenny; 128	<i>Zoarces viviparus</i> ; Viviparous Blenny	-
7	<i>Agonus cataphractus</i> ; Pogge (Hook-nose); 122	<i>Agonus cataphractus</i> ; Pogge / Hooknose	-
8	<i>Pomatoschistus minutus</i> ; Sand Goby; 69	<i>Pomatoschistus minutus</i> ; Sand Goby	-
9	<i>Liparis liparis</i> ; Seasnail; 71	<i>Liparis liparis</i> ; Common Seasnail	-
10	<i>Syngnathus acus</i> ; Greater Pipe-fish; 315	<i>Syngnathus acus</i> ; Greater Pipefish	-
11	<i>Callionymus lyra</i> ; Common Dragonet; 150	<i>Callionymus lyra</i> ; Common Dragonet	-
12	<i>Gobius niger</i> ; Black Goby; 101	<i>Gobius niger</i> ; Black Goby	-
13	<i>Myoxocephalus scorpius</i> ; Bull rout; 119	<i>Myoxocephalus scorpius</i> ; Bull Rout	-
14	<i>Platichthys flesus</i> ; Flounder; 175	<i>Platichthys flesus</i> ; Flounder	-
15	<i>Trisopterus luscus</i> ; Bib; 176	<i>Trisopterus luscus</i> ; Bib / Pouting	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
 Return Deadline - 13/12/2013
 Data Received - 11/12/2013
 Specimens Received - 11/12/2013
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2039

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicomarine

Specimen No.	Laboratory Id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Trisopterus luscus</i> ; Bib or pouting; 140	<i>Trisopterus luscus</i> ; Bib / Pouting	sp
2	<i>Platichthys flesus</i> ; Flounder; 65	<i>Limanda limanda</i> ; Dab	TE - Lateral line is curved above the pectoral fin
3	<i>Callionymus reticulatus</i> ; Reticulated Dragonet; 137	<i>Callionymus lyra</i> ; Common Dragonet	TE - Four spines on the preoperculum, lack of two rows of conspicuous spots along body
4	<i>Merlangius merlangus</i> ; Whiting; 105	<i>Merlangius merlangus</i> ; Whiting	-
5	<i>Aphia minuta</i> ; Transparent Goby; 30	<i>Aphia minuta</i> ; Transparent Goby	-
6	<i>Solea solea</i> ; Common or Dover Sole; 175	<i>Solea solea</i> ; Common Sole	-
7	<i>Pollachius pollachius</i> ; Pollack; 180	<i>Pollachius pollachius</i> ; Pollack	-
8	<i>Buglossidium luteum</i> ; Solenette; 95	<i>Buglossidium luteum</i> ; Solenette	-
9	<i>Clupea harengus</i> ; Herring; 109	<i>Clupea harengus</i> ; Herring	-
10	<i>Pleuronectes platessa</i> ; Plaice; 83	<i>Pleuronectes platessa</i> ; Plaice	-
11	<i>Syngnathus acus</i> ; Greater Pipefish; 64	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	TE - Dorsal fin covers 12 body ring covers
12	<i>Crenilabrus melops</i> ; Corkwing Wrasse; 56	<i>Symphodus melops</i> ; Corkwing Wrasse	sy
13	<i>Pomatoschistus minutus</i> ; Sand Goby; 55	<i>Pomatoschistus minutus</i> ; Sand Goby	-
14	<i>Gobius niger</i> ; black Goby; 30, 25	<i>Gobius paganellus</i> ; Rock Goby and <i>Pomatoschistus pictus</i> ; Painted Goby	mx, TE - <i>G. paganellus</i> Front nostril with a tentacle TE- <i>P. pictus</i> no process from anterior nostril, ventral head pigmentation
15	-	-	No fish submitted

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 08/01/2014

Specimens Received -11/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2040

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Ctenolabrus rupestris</i> ; Goldsinny Wrasse; 48	<i>Ctenolabrus rupestris</i> ; Goldsinny	-
2	<i>Pomatoschistus pictus</i> ; Painted Goby; 44	<i>Pomatoschistus pictus</i> ; Painted Goby	-
3	<i>Pleuronectes platessa</i> ; Plaice; 116	<i>Pleuronectes platessa</i> ; Plaice	-
4	<i>Limanda limanda</i> ; Dab; 79	<i>Limanda limanda</i> ; Dab	-
5	<i>Trachurus trachurus</i> ; Scad; 55, 50	<i>Trachurus trachurus</i> ; Scad / Atlantic Horse Mackerel	-
6	<i>Mullus surmuletus</i> ; Striped Red Mullet; 77	<i>Mullus surmuletus</i> ; Red / Red Striped Mullet	-
7	<i>Crenilabrus melops</i> ; Corkwing Wrasse; 75	<i>Symphodus melops</i> ; Corkwing Wrasse	sy
8	<i>Syngnathus rostellatus</i> ; Lesser Pipefish; 105, 95, 45	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
9	<i>Agonus cataphractus</i> ; Pogge; 46	<i>Agonus cataphractus</i> ; Pogge / Hooknose	-
10	<i>Callionymus lyra</i> ; Common Dragonet; 86	<i>Callionymus lyra</i> ; Common Dragonet	-
11	<i>Chelidonichthys lucerna</i> ; Tub Gurnard; 134	<i>Chelidonichthys lucerna</i> ; Tub Gurnard	-
12	<i>Merlangus merlangus</i> ; Whiting; 102	<i>Merlangus merlangus</i> ; Whiting	-
13	<i>Dentex maroccanus</i> ; Morocco Dentex; 31	<i>Dentex maroccanus</i> ; Morocco Dentex	sp
14	<i>Arnoglossus laterna</i> ; Scald fish; 123	<i>Arnoglossus laterna</i> ; Scaldfish	-
15	<i>Buglossidium luetum</i> ; Solenette; 115, 35	<i>Buglossidium luteum</i> ; Solenette	sp

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 20/12/2013

Specimens Received - 11/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2041

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory Id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Gadus morhua</i> ; Cod; 158	<i>Gadus morhua</i> ; Cod	-
2	<i>Aphia minuta</i> ; Transparent goby; 45	<i>Aphia minuta</i> ; Transparent Goby	-
3	<i>Trisopterus luscus</i> ; Pout; 123	<i>Trisopterus luscus</i> ; Pouting	-
4	<i>Sprattus sprattus</i> ; Sprat; 115	<i>Sprattus sprattus</i> ; Sprat	-
5	<i>Pomatoschistus minutus</i> ; Sand goby; 34	<i>Pomatoschistus minutus</i> ; Sand Goby	-
6	<i>Trigla lucerna</i> ; Tub Gurnard; 55	<i>Chelidonichthys lucerna</i> ; Tub Gurnard	sy
7	<i>Syngnathus rostellatus</i> ; Nilssons pipe fish; 81	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
8	<i>Mullus surmuletus</i> ; Red mullet; 53	<i>Mullus surmuletus</i> ; Red / Red Striped Mullet	-
9	<i>Trachurus trachurus</i> ; Scad; 35	<i>Trachurus trachurus</i> ; Scad / Atlantic Horse Mackerel	-
10	<i>Hyperoplus lanceolatus</i> ; greater sand eel; 103	<i>Hyperoplus immaculatus</i> ; Corbin's Sandeel	TE - Upper jaw uniformly dark, absence of dark patch on snout
11	<i>Syngnathus rostellatus</i> ; Nilssons pipe fish; 125	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
12	<i>Pleuronectes platessa</i> ; Plaice; 53	<i>Pleuronectes platessa</i> ; Plaice	-
13	<i>Merlangius merlangus</i> ; Whiting; 77	<i>Merlangius merlangus</i> ; Whiting	-
14	<i>Aspitrigla cuculus</i> ; Red Gurnard; 183	<i>Chelidonichthys cuculus</i> ; Red Gurnard	sy
15	<i>Dicentrarchus labrax</i> ; Bass; 40, 56	<i>Dicentrarchus labrax</i> ; Sea Bass	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
 Return Deadline - 13/12/2013
 Data Received - 13/12/2012
 Specimens Received - 13/12/2012
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2042

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicmarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicmarine Identification	Code / Comments
1	<i>Agonus cataphractus</i> ; Pogge; 102	<i>Agonus cataphractus</i> ; Pogge / Hooknose	-
2	<i>Echiichthys vipera</i> ; Lesser Weaver; 105	<i>Echiichthys vipera</i> ; Lesser Weever	-
3	<i>Merlangius merlangus</i> ; Whiting; 136	<i>Merlangius merlangus</i> ; Whiting	-
4	<i>Pomatoschistus microps</i> ; Common Goby; 42	<i>Pomatoschistus pictus</i> ; Painted Goby	TE - Ventral head pigmentation
5	<i>Sprattus sprattus</i> ; Sprat; 62	<i>Sprattus sprattus</i> ; Sprat	-
6	<i>Clupea harengus</i> ; Herring; 70	<i>Clupea harengus</i> ; Herring	-
7	<i>Pleuronectes platessa</i> ; Plaice; 95	<i>Pleuronectes platessa</i> ; Plaice	-
8	<i>Platichthys flesus</i> ; Flounder; 70	<i>Platichthys flesus</i> ; Flounder	-
9	<i>Pomatoschistus minutus</i> ; Sand Goby; 80	<i>Pomatoschistus minutus</i> ; Sand Goby	-
10	<i>Syngnathus rostellatus</i> ; Lesser Pipefish; 115	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
11	Unknown Sand Eel; 117, 144	<i>Ammodytes tobianus</i> ; Lesser Sandeel	TE - Teeth absent in the roof of the mouth, mouth is able to form an extended tube, found inshore
12	<i>Lampetra fluviatilis</i> ; Lampern; 119	<i>Lampetra fluviatilis</i> ; River Lamprey	sp
13	<i>Trisopterus minutus</i> ; Poor Cod; 79	<i>Trisopterus minutus</i> ; Poor Cod	-
14	<i>Gadus morhua</i> ; Cod; 169	<i>Gadus morhua</i> ; Cod	-
15	5 Bearded Rockling; 155	<i>Ciliata septentrionalis</i> ; Northern Rockling	sp, TE - Lobes along the folds of skin above the upper jaw

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 11/12/2013

Specimens Received - 11/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2059

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine identification	Code / Comments
1	<i>Chelidonichthys cuculus</i> ; Red gurnard; 224	<i>Chelidonichthys cuculus</i> ; Red Gurnard	-
2	<i>Trisopterus minutus</i> ; Poor cod; 80	<i>Trisopterus minutus</i> ; Poor Cod	-
3	<i>Callionymus maculatus</i> ; Spotted dragonet; 105	<i>Callionymus maculatus</i> ; Spotted Dragonet	-
4	<i>Callionymus lyra</i> ; Common dragonet; 134	<i>Callionymus lyra</i> ; Common Dragonet	-
5	<i>Microstomus kitt</i> ; Lemon sole; 191	<i>Microstomus kitt</i> ; Lemon Sole	-
6	<i>Scomber scombrus</i> ; Mackerel; 267	<i>Scomber scombrus</i> ; Atlantic Mackerel	-
7	<i>Micromesistius poutassou</i> ; Blue whiting; 156	<i>Micromesistius poutassou</i> ; Blue Whiting	-
8	<i>Glyptocephalus cynoglossus</i> ; Witch; 342	<i>Glyptocephalus cynoglossus</i> ; Witch	-
9	<i>Microchirus variegatus</i> ; Thickback sole; 124	<i>Microchirus variegatus</i> ; Thickback Sole	-
10	<i>Pleuronectes platessa</i> ; Plaice; 137	<i>Pleuronectes platessa</i> ; Plaice	-
11	<i>Limanda limanda</i> ; Dab; 158	<i>Limanda limanda</i> ; Dab	-
12	<i>Trisopterus luscus</i> ; Bib; 224	<i>Trisopterus luscus</i> ; Bib / Pouting	-
13	<i>Trigloporus lastoviza</i> ; Streaked gurnard; 276	<i>Trigloporus lastoviza</i> ; Streaked Gurnard	-
14	<i>Hippoglossoides platessoides</i> ; Long rough dab; 123	<i>Hippoglossoides platessoides</i> ; Long Rough Dab	-
15	<i>Arnoglossus laterna</i> ; Scaldfish; 91	<i>Arnoglossus laterna</i> ; Scaldfish	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
 Return Deadline - 13/12/2013
 Data Received - 11/12/2013
 Specimens Received - 13/12/2013
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2063

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicmarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicmarine identification	Code / Comments
1	<i>Clupea harengus</i> ; Herring; 72	<i>Clupea harengus</i> ; Herring	-
2	<i>Liza aurata</i> ; Golden grey mullet; 93	<i>Liza ramada</i> ; Thin-lipped mullet	TE - Pectoral fin does not extend to or beyond the eye
3	<i>Liza ramada</i> ; Thin lipped mullet; 88	<i>Liza ramada</i> ; Thin-lipped Mullet	-
4	<i>Platichthys flesus</i> ; Flounder; 132	<i>Platichthys flesus</i> ; Flounder	-
5	<i>Pollachius pollachius</i> ; Pollack; 173	<i>Pollachius pollachius</i> ; Pollack	-
6	<i>Trachurus trachurus</i> ; Scad; 58	<i>Trachurus trachurus</i> ; Scad / Atlantic Horse Mackerel	-
7	<i>Atherina presbyter</i> ; Sand smelt; 147	<i>Atherina presbyter</i> ; Sand Smelt	-
8	?;?;38	<i>Pomatoschistus minutus</i> ; Sand Goby	TE - Villi present on anterior membrane, ventral head pigmentation
9	<i>Ammodytes tobianus</i> ; Lesser sand eel; 105	<i>Ammodytes tobianus</i> ; Lesser Sandeel	-
10	<i>Pleuronectes platessa</i> ; Plaice; 74	<i>Pleuronectes platessa</i> ; Plaice	-
11	<i>Lipophrys pholis</i> ; Shanny; 80	<i>Lipophrys pholis</i> ; Shanny	-
12	<i>Syngnathus acus</i> ; Greater pipefish; 125	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	TE - Dorsal fin covers 12 body rings
13	<i>Syngnathus rostellatus</i> ; Lesser pipefish; 105	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
14	<i>Spinachia spinachia</i> ; 15 Spinned stickleback; 110	<i>Spinachia spinachia</i> ; Fifteen-spinned Stickleback	-
15	<i>Sprattus sprattus</i> ; Sprat; 50	<i>Sprattus sprattus</i> ; Sprat	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
 Return Deadline - 13/12/2013
 Data Received - 10/12/2013
 Specimens Received - 12/12/2013
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2064

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicomarine

Specimen No.	Laboratory Id. (Genus species; common name; length in mm)	Thomson Unicomarine Identification	Code / Comments
1	<i>Limanda limanda</i> ; Dab; 196	<i>Limanda limanda</i> ; Dab	-
2	<i>Platichthys flesus</i> ; Flounder; 125	<i>Platichthys flesus</i> ; Flounder	-
3	<i>Pomatoschistus minutus</i> ; Sand Goby; 65	<i>Pomatoschistus minutus</i> ; Sand Goby	-
4	<i>Ammodytes tobianus</i> ; Lesser Sandeel; 107	<i>Ammodytes tobianus</i> ; Lesser Sandeel	-
5	<i>Hyperoplus lanceolatus</i> ; Greater Sandeel; 185	<i>Hyperoplus lanceolatus</i> ; Greater Sandeel	-
6	<i>Pleuronectes platessa</i> ; Plaice; 60, 141	<i>Pleuronectes platessa</i> ; Plaice	-
7	<i>Atherina presbyter</i> ; Sand smelt; 72	<i>Atherina presbyter</i> ; Sand Smelt	-
8	<i>Sprattus sprattus</i> ; Sprat; 88	<i>Clupea harengus</i> ; Herring	TE - The dorsal fin origin is positioned in front of the pelvic fin origin, 13 - 16 scales between the pelvic fin base and vent.
9	<i>Liza ramanda</i> ; Thin Lipped Grey Mullet; 99	<i>Liza ramanda</i> ; Thin-lipped Grey Mullet	-
10	<i>Pomatoschistus microps</i> ; Common Goby; 47	<i>Pomatoschistus minutus</i> ; Sand Goby	TE - Ventral head pigmentation
11	<i>Crenilabrus melops</i> ; Corkwing Wrasse; 45	<i>Crenilabrus melops</i> ; Corkwing Wrasse	-
12	<i>Syngnathus acus</i> ; Greater Pipefish; 116	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	TE - Dorsal fin covers 12 body rings
13	<i>Agonus cataphractus</i> ; Hooknosed Pogge; 59	<i>Agonus cataphractus</i> ; Pogge / Hooknose	-
14	<i>Spinachia spinachia</i> ; 15 Spined Stickleback; 96	<i>Spinachia spinachia</i> ; Fifteen-spined Stickleback	-
15	<i>Echiichthys vipera</i> ; Lesser Weever; 84	<i>Echiichthys vipera</i> ; Lesser Weever	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
Return Deadline - 13/12/2013
Data Received - 17/12/2013
Specimens Received - 17/12/2013
Number of Subscribing Laboratories - 24
Laboratory Code - 2065

Key to codes:

TE - Taxonomic error
sp - Spelling error
sy - Synonym
mx - Mixture of species
* - Problem taxa indicated
TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine identification	Code / Comments
1	<i>Merlangius merlangus</i> ; Whiting; 123	<i>Merlangius merlangus</i> ; Whiting	-
2	<i>Sprattus sprattus</i> ; Sprat; 93	<i>Sprattus sprattus</i> ; Sprat	-
3	<i>Platichthys flesus</i> ; Flounder; 109	<i>Platichthys flesus</i> ; Flounder	-
4	<i>Pomatoschistus minutus</i> ; Sand Goby; 30, 29, 30	<i>Pomatoschistus minutus</i> ; Sand Goby	-
5	<i>Dicentrarchus labrax</i> ; Sea Bass; 122	<i>Dicentrarchus labrax</i> ; Sea Bass	-
6	<i>Trisopterus minutus</i> ; Poor Cod; 86	<i>Trisopterus minutus</i> ; Poor Cod	-
7	<i>Pomatoschistus microps</i> ; Common Goby; 42	<i>Pomatoschistus microps</i> ; Common Goby	-
8	<i>Clupea harengus</i> ; Herring; 60	<i>Clupea harengus</i> ; Herring	-
9	<i>Trisopterus luscus</i> ; Pouting; 114	<i>Trisopterus luscus</i> ; Bib / Pouting	-
10	<i>Merlangius merlangus</i> ; Whiting; 286	<i>Merlangius merlangus</i> ; Whiting	-
11	<i>Mullus surmuletus</i> ; Red Mullet; 50, 51	<i>Mullus surmuletus</i> ; Red / Red Striped Mullet	-
12	<i>Syngnathus rostellatus</i> ; Lesser Pipefish; 85, 78, 73	<i>Syngnathus rostellatus</i> ; Lesser / Nilsson's Pipefish	-
13	<i>Eutrigla gurnardus</i> / <i>Chelidonichthys lucerna</i> ; Grey Gurnard / Tub Gurnard; 68	<i>Chelidonichthys lucerna</i> ; Tub Gurnard	TE - Pectoral fins reach past the vent, no dusky blotch on the 1st dorsal fin
14	<i>Ciliata mustela</i> ; 5 Bearded Rockling; 105	<i>Ciliata mustela</i> ; Five-bearded Rockling	-
15	<i>Gadus morhua</i> ; Cod; 154, 139	<i>Gadus morhua</i> ; Cod	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT04
 Return Deadline - 13/12/2013
 Data Received - 15/11/2013
 Specimens Received - 15/11/2013
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2067

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine identification	Code / Comments
1	<i>Dicentrarchus labrax</i> ; Sea Bass; 89	<i>Dicentrarchus labrax</i> ; Sea Bass	-
2	<i>Atherina presbyter</i> ; Sand Smelt; 50	<i>Atherina presbyter</i> ; Sand Smelt	-
3	<i>Trisopterus luscus</i> ; Pouting; 136	<i>Trisopterus luscus</i> ; Pouting	-
4	<i>Platichthys flesus</i> ; Flounder; 167	<i>Platichthys flesus</i> ; Flounder	-
5	<i>Liza ramada</i> ; Thin Lipped Grey Mullet; 98	<i>Liza ramada</i> ; Thin-lipped Grey Mullet	-
6	<i>Lipophrys pholis</i> ; Shanny; 91	<i>Lipophrys pholis</i> ; Shanny	-
7	<i>Spondyliosoma cantharus</i> ; Black Bream; 66	<i>Spondyliosoma cantharus</i> ; Black Bream	-
8	<i>Pollachius pollachius</i> ; Pollack; 124	<i>Pollachius pollachius</i> ; Pollack	-
9	<i>Merlangius merlangus</i> ; Whiting; 186	<i>Merlangius merlangus</i> ; Whiting	-
10	<i>Spinachia spinachia</i> ; 15 Spined Stickleback; 97	<i>Spinachia spinachia</i> ; Fifteen-spined Stickleback	-
11	<i>Labrus bergylta</i> ; Ballan Wrasse; 75	<i>Labrus bergylta</i> ; Ballan Wrasse	-
12	<i>Crenilabrus melops</i> ; Corkwing Wrasse; 57	<i>Crenilabrus melops</i> ; Corkwing Wrasse	-
13	<i>Gobius panganellus</i> ; Rock Goby; 65	<i>Gobius panganellus</i> ; Rock Goby	-
14	<i>Gobius niger</i> ; Black Goby; 86	<i>Gobius niger</i> ; Black Goby	-
15	<i>Nerophis lumbriciformes</i> ; Worm Pipefish; 55	<i>Nerophis lumbriciformes</i> ; Worm Pipefish	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05
 Return Deadline - 13/12/2013
 Data Received - 12/11/2013
 Specimens Received - 12/11/2013
 Number of Subscribing Laboratories - 24
 Laboratory Code - 2069

Key to codes:

TE - Taxonomic error
 sp - Spelling error
 sy - Synonym
 mx - Mixture of species
 * - Problem taxa indicated
 TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name)	Thomson Unicomarine identification	Code / Comments
1	<i>Dicentrarchus labrax</i> ; Sea Bass; 37	<i>Dicentrarchus labrax</i> ; Sea Bass	-
2	<i>Pomatoschistus microps</i> ; Common Goby; 42	<i>Pomatoschistus minutus</i> ; Sandy Goby	TE - Ventral head pigmentation, villi on anterior membrane
3	<i>Pomatoschistus minutus</i> ; Sandy Goby; 38	<i>Pomatoschistus microps</i> ; Common Goby	TE - Ventral head pigmentation
4	<i>Clupea harengus</i> ; Herring; 84,73	<i>Clupea harengus</i> ; Herring	-
5	<i>Osmerus eperlanus</i> ; Smelt; 95	<i>Osmerus eperlanus</i> ; Smelt	-
6	<i>Atherina presbyter</i> ; Sand Smelt; 50	<i>Atherina presbyter</i> ; Sand Smelt	-
7	<i>Atherina presbyter</i> ; Sand Smelt; 85	<i>Atherina presbyter</i> ; Sand Smelt	-
8	<i>Sander lucioperca</i> ; Zander; 159	<i>Sander lucioperca</i> ; Zander	-
9	<i>Clupea harengus</i> ; Herring; 80	<i>Clupea harengus</i> ; Herring	-
10	<i>Merlnagius merlangus</i> ; Whiting; 85	<i>Merlnagius merlangus</i> ; Whiting	-
11	<i>Leuciscus leuciscus</i> ; Dace; 61	<i>Leuciscus leuciscus</i> ; Dace	-
12	<i>Platichthys flesus</i> ; Flounder; 89, 89, 90	<i>Platichthys flesus</i> ; Flounder	-
13	<i>Dicentrarchus labrax</i> ; Sea Bass; 33	<i>Dicentrarchus labrax</i> ; Sea Bass	-
14	<i>Abramis brama</i> ; Common Bream; 110, 84, 86	<i>Abramis brama</i> ; Common Bream	-
15	<i>Leuciscus leuciscus</i> ; Dace; 90	<i>Leuciscus leuciscus</i> ; Dace	-

EXERCISE DETAILS

Fish Reverse Ring Test - F_RRT05

Return Deadline - 13/12/2013

Data Received - 26/11/2013

Specimens Received - 02/12/2013

Number of Subscribing Laboratories - 24

Laboratory Code - 2070

Key to codes:

TE - Taxonomic error

sp - Spelling error

sy - Synonym

mx - Mixture of species

* - Problem taxa indicated

TUM - Thomson Unicomarine

Specimen No.	Laboratory id. (Genus species; common name; length in mm)	Thomson Unicomarine identification	Code / Comments
1	<i>Merlangius merlangus</i> ; Whiting; 161	<i>Merlangius merlangus</i> ; Whiting	-
2	<i>Zoarces viviparus</i> ; Viviparous blenny; 158	<i>Zoarces viviparus</i> ; Viviparous Blenny	-
3	<i>Myoxocephalus scorpius</i> ; Bull rout; 69	<i>Myoxocephalus scorpius</i> ; Bull Rout	-
4	<i>Gobius niger</i> ; Black goby; 98	<i>Gobius niger</i> ; Black Goby	-
5	<i>Platichthys flesus</i> ; Flounder; 98	<i>Platichthys flesus</i> ; Flounder	-
6	<i>Gobiusculus flavescens</i> ; Two spotted goby; 50	<i>Gobiusculus flavescens</i> ; Two-spotted Goby	-
7	<i>Pomatoschistus minutus</i> ; Sand goby; 61	<i>Pomatoschistus minutus</i> ; Sand Goby	-
8	<i>Clupea harengus</i> ; Herring; 76	<i>Clupea harengus</i> ; Herring	-
9	<i>Sprattus sprattus</i> ; Sprat; 45	<i>Sprattus sprattus</i> ; Sprat	-
10	<i>Atherina presbyter</i> ; Sand smelt; 58	<i>Atherina presbyter</i> ; Sand Smelt	-
11	<i>Limanda limanda</i> ; Dab; 40	<i>Limanda limanda</i> ; Dab	-
12	<i>Chelon labrosus</i> ; Thick lipped mullet; 33	<i>Liza aurata</i> ; Golden Grey Mullet	TE - Ventral head pigmentation
13	<i>Sprattus sprattus</i> ; Sprat; 57	<i>Sprattus sprattus</i> ; Sprat	-
14	<i>Clupea harengus</i> ; Herring; 59	<i>Clupea harengus</i> ; Herring	-
15	<i>Chelon labrosus</i> ; Thick lipped mullet; 27	<i>Liza aurata</i> ; Golden Grey Mullet	TE - Ventral head pigmentation

Appendix 1

References

Kay, P. and Dipper F. (2009). A Field Guide to the Marine Fishes of Wales and adjacent waters. Marine Wildlife, Llanfairfechan.

Lythgoe, J. and Lythgoe, G. (1991). Fishes of the Sea. The North Atlantic and Mediterranean, Blandford.

Maitland, P.S. (2004). Keys to the Freshwater Fish of Britain and Ireland, with notes on their distribution and ecology. Freshwater Biological Association Scientific Publication No.62, pp. 73

Maitland, P.S. and Herdson, D (2009). Key to the Marine and Freshwater Fishes of Britain and Ireland. Environment Agency.

Wheeler, A. (1969). The Fishes of the British Isles and North West Europe. Macmillian and Co Ltd.