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Marked salmon production by the hatcheries of Russia in 2008

by

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Abstract

Marking of salmon of the brood year 2007 was conducted in Magadan, Kamchatski and Khabarovski regions of the Far East of Russia. Totally released were 43 million marked salmon. They are 29 million of chum, 9.6 million of sockey, 1.6 million of coho, 0.78 million of chinook and 2 million of masu. 18 patterns of marking were used to mark the salmon of the brood year 2007.

Marking and Pacific young salmon release in 2008 was conducted in the Magadanski, Kamchatski and Khabarovski regions of the Far East of Russia. Total number of released hatchery marking salmon is about 43 millions. 29 million are chum salmon, 9,6 million are sockeye salmon, 1,6 million are coho salmon, 0,78 million are chinook salmon and 2 million are masu salmon. Chum salmon, coho salmon, sockeye salmon and chinook salmon were marked at six hatcheries of Kamchatka. Chum salmon and coho salmon were marked at the hatcheries of the Magadan region. Chum salmon and masu salmon were marked only at one hatchery in the Khabarovski region instead of five planned hatcheries. Such plan change in young salmon marking at the hatcheries of the Khabarovski region is due to the problems in selecting the successful use of dry marking under the conditions of daily temperature dynamics during the autumn period.

Some change in planned marking use was observed at other hatcheries of the Far East of Russia too. Such measure was undertaken for the increase of quality of salmon marking released from hatcheries of the Far East of Russia. No total marking was used at Paratunski hatchery (Kamchatcka) in 2007 as opposed to the previous years. Next year we plan to conduct experimental marking of small amount of embryos to choose the optimal regimes of marking at this hatchery.

Eighteen different marking patterns were used for salmon marking in 2007.

The data on marked salmon released from the hatcheries of Russia are presented in the table 1.

The thermal marking pattern is presented as the RBr notation (Munk and Geiger 1998; Hagen 1999) and Hatch code notation (Hagen et al. 2000).

References

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Munk, K. M., and H. J. Geiger. 1998. Thermal marking of otoliths: the "RBr" coding structure of thermal marks. (NPAFC Doc. 367) 19 p. CWT & Otolith Processing Lab., Alaska Department of Fish and Game, Juneau, Alaska, USA.

Table 1. Otolith marks released from Russia hatcheries for 2007 brood year stocks of salmon

№№	Mark Type	BROOD YEAR	YEAR OF RELEASE	SPECIES	COUNTRY	STATE/ PROVINCE	AGENCY	FACILITY	RBr	HATCH CODE	Pre-Hatch Graphic	Post-Hatch Graphic	Number Released Released
1	2	3	4	5	6	7	8	9	10	11	12	13	14
RU07-01	DM	2007	2008	chum	Russia	Magadanskaya	OkhotskRV	Armansky Hatchery	1:1.7	3,3H		I I I I I I	5719809
RU07-02	DM	2007	2008	chum	Russia	Magadanskaya	OkhotskRV	Armansky Hatchery	1:1.7	3,3H		I I I I I I	500000
RU07-03	DM	2007	2008	chum	Russia	Magadanskaya	OkhotskRV	Armansky Hatchery	1:1.7	3,3H		I I I I I I	1272630
RU07-04	DM	2007	2008	chum	Russia	Magadanskaya	OkhotskRV	Olsky Hatchery	1:1.4, 2.3	4,3H		I I I I I I I	2550566
RU07-05	DM	2007	2008	chum	Russia	Magadanskaya	OkhotskRV	Olsky Hatchery	1:1.4, 2.3	4,3H		I I I I I I I	997890
RU07-06	DM	2007	2008	chum	Russia	Magadanskaya	MagadanNIRO	Olsky Hatchery	1:1.4,2.3n	4,3nH		I I I I III	200000
RU07-07	DM	2007	2008	chum	Russia	Magadanskaya	OkhotskRV	Tauysky Hatchery	1:1.4, 2.3	4,3nH		I I I I III	201703
RU07-08	DM	2007	2008	chum	Russia	Magadanskaya	OkhotskRV	Yansky Hatchery	1:1.3n-2.3n	3n,3nH		III III	908867
RU07-09	DM	2007	2008	chum	Russia	Kamchatka	Sev-VostRV	Ozerkovsky Hatchery	1:1.3,2.5	3,5H		I I I I I I I I	1548465
RU07-10	DM	2007	2008	chum	Russia	Kamchatka	Sev-VostRV	Ketkinsky Hatchery	1:1.3,2.3	3,3H		I I I I I I	2841105
RU07-11	DM	2007	2008	chum	Russia	Kamchatka	Sev-VostRV	Ketkinsky Hatchery	1:1.3,2.3	3,3H		I I I I I I	7476039
RU07-12	DM	2007	2008	chum	Russia	Kamchatka	Sev-VostRV	Paratunsky Hatchery	1:1.6	6H		I I I I I I	100000
RU07-13	DM	2007	2008	chum	Russia	Kamchatka	Sev-VostRV	Viluysky Hatchery	1:1.4,2.2,3.1	4,2,1H		I I I I I I I I	589077
RU07-14	DM	2007	2008	chum	Russia	Kamchatka	Sev-VostRV	Yuzhno-Kamchatsky Hatchery	1:1.5,2.1	5,1H		I I I I I I	333047
RU07-15	DM	2007	2008	chum	Russia	Khabarovskaya	OOO Kometa	Kometa Hatchery	1:1.8n	8nH		IIIIIIII	3800000
RU07-16	DM	2007	2008	sockeye	Russia	Kamchatka	Sev-VostRV	Ozerkovsky Hatchery	1:1.3,2.1,3.2	3,1,2H		I I I I I I	8604809
RU07-17	DM	2007	2008	sockeye	Russia	Kamchatka	Sev-VostRV	Ozerkovsky Hatchery	1:1.3,2.1,3.2	3,1,2H		I I I I I I	430000
RU07-18	TM	2007	2009	sockeye	Russia	Kamchatka	Sev-VostRV	Malkinsky Hatchery	1:1.3,2.2	3,2H		I I I I I	533870
RU07-19	DM	2007	2008	coho	Russia	Magadanskaya	OkhotskRV	Olsky Hatchery	1:1.4,2.3	4,3H		I I I I I I I	453605
RU06-33	DM	2006	2008	coho	Russia	Magadanskaya	OkhotskRV	Olsky Hatchery	1:1.5	5H		I I I I I	10050
RU06-34	DM	2006	2008	coho	Russia	Magadanskaya	OkhotskRV	Yansky Hatchery	1:1.6n	6nH		IIIIII	123627
RU07-20	DM	2007	2008	coho	Russia	Kamchatka	Sev-VostRV	Paratunsky Hatchery	1:1.4	4H		I I I I	432814
RU07-21	DM	2007	2008	coho	Russia	Kamchatka	Sev-VostRV	Viluysky Hatchery	1:1.3,2.2,3.2	3H		I I I I I I	366711
RU06-35	DM	2006	2008	coho	Russia	Kamchatka	Sev-VostRV	Viluysky Hatchery	1:1.3,2.2,3.1	3,2,1H		I I I I I I	186224
RU07-22	TM	2007	2009	chinook	Russia	Kamchatka	Sev-VostRV	Malkinsky Hatchery	2:1.3,2.2	H3,2	I I I I I		779825
RU07-23	DM	2007	2008	masu	Russia	Khabarovskaya	OOO Kometa	Kometa Hatchery	1:1.4n,2.2n	4n,2nH		IIII II	2000000