

Nature
Glenelg
Trust



VICTORIAN MULLOWAY TAGGING

Newsletter No. 5 - July 2020

Welcome to the fifth edition of the Victorian Mullet Tagging Newsletter. The purpose of this newsletter is to provide anglers with a summary of the tag and recapture data collected across Victoria and interstate. This recreational tagging program is funded by the Victorian Fisheries Authority through Recreational Fishing License Fees and relies on the valued involvement of anglers.

While funded project will finish at the end of the year, the tagging program will still essentially continue (largely in a voluntary capacity). With hundreds of tagged Mullet swimming around in our waters, it's important we continue to record recaptures (with your help!) and share these findings with you. We do however only have a small number of tags left so basically 'when they're gone, they're gone'. So please, if you find yourself no longer using your kit, please consider sending it back to us (see address on last page) so we can send onto others.



Stanley Aardenburg joined the program late last year – just in time to fish the South East beaches in SA over summer. This is one of six fish Stanley has tagged, and his largest at 128 cm.

Tagged Fish

Over 650 fish have now been tagged which is a great effort. Figure 1 shows the number of Mulloway tagged and recaptured in each month and year. Late spring and summer has seen the highest fish tagged, with smaller peaks in autumn. In 2019, almost fifty fish were tagged in April alone, which was the highest for the year. While around 50 Mulloway were tagged during the first few months of 2020, April and May saw only a handful tagged due to the COVID restrictions and Victorian fishing ban. Those tagged were caught in the SA section of the Glenelg River. In addition to the recapture data, the tagging information itself also provides key population insights.

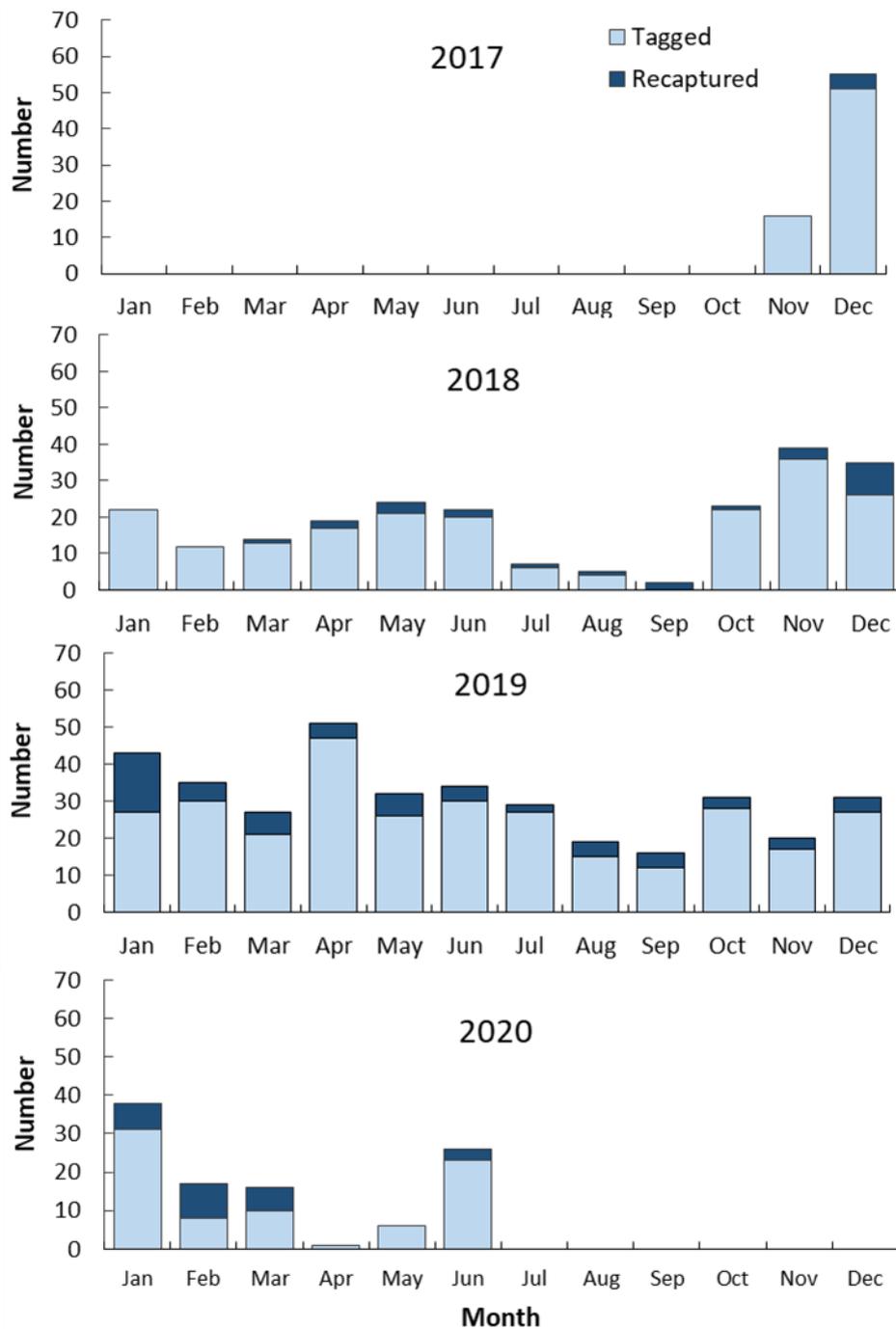


Figure 1. Monthly numbers of Mulloway tagged and recaptured in each year.

As expected, recapture numbers were relatively low during the first 12 months of the program. Numbers started to increase in December 2018, when 9 tagged fish were caught, and again in January 2019 when 16 were recorded. The highest recaptures have generally occurred during summer and early autumn. The drop in both tagged and recaptured Mulloway during winter to early spring, coincides with reduced fishing effort but also potential seasonal movements out of the estuaries.

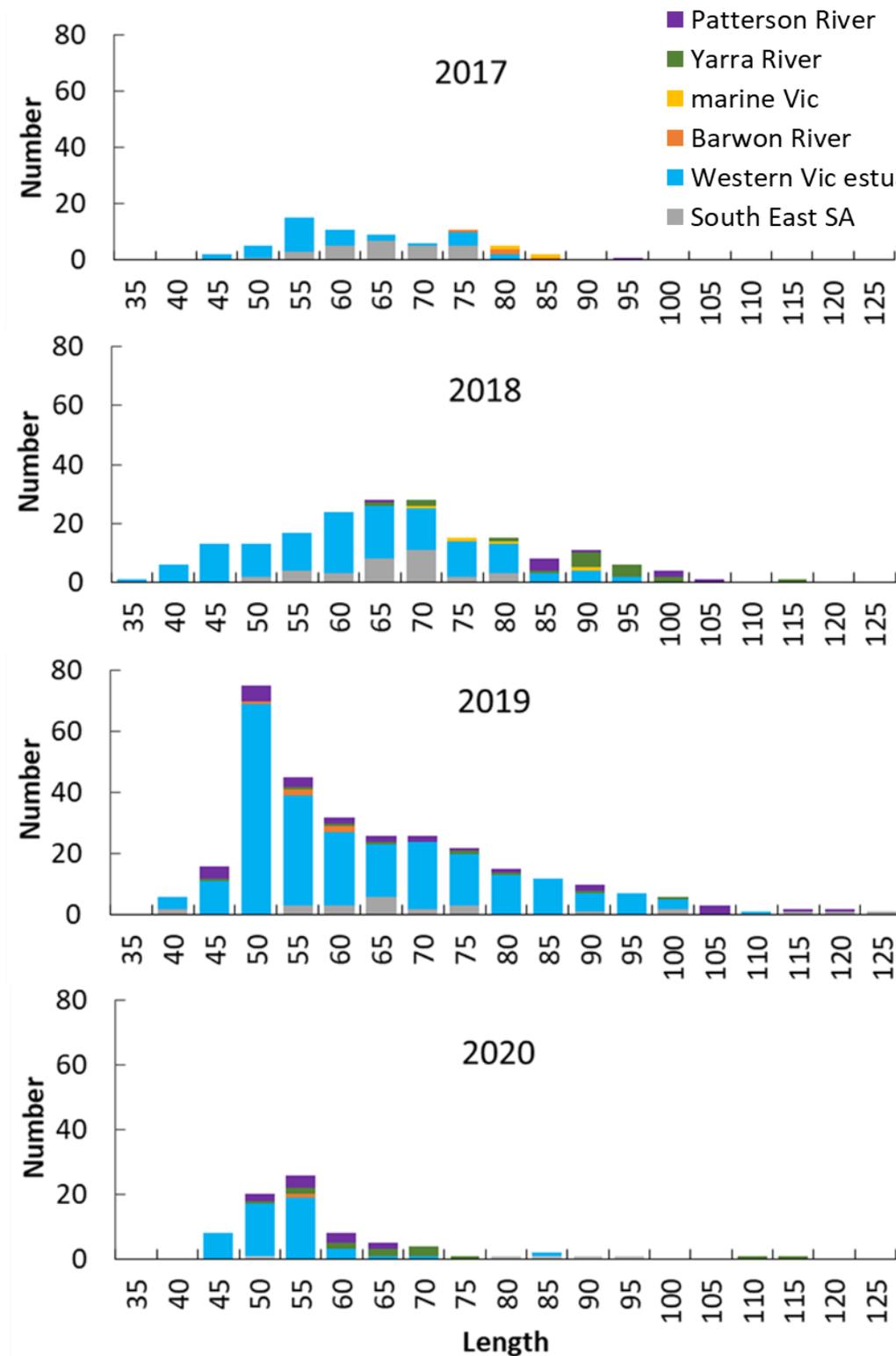


Figure 2. Length frequency of tagged Mulloway in each year.

Figure 2 shows the relative abundance of the different size classes of tagged Mulloway in each year. Many of you will recall back in 2014, the majority of Mulloway in our estuaries were on the smaller side (50-60 cm). This strong year class supported the fishery over the proceeding 3-4 years and was linked to significant spawning and recruitment in 2011, in response to high flows. The figure below shows another abundant group of juveniles (50-60 cm) in 2019. These fish would be approximately 3 years of age, which means they are probably the result of similar successful spawning in 2016 following high rainfall.

Top taggers (as of July 2020)

Tim Murrell remains at the top of the tagged Mulloway leader board. Mark Hadden and Michael Gordon have also tagged ‘half a century’, while Aron Coleman and Shane Murphy are well on their way. Bodhi Pannenburg, Shane Lowery and Shane Murrell are all on equal sixth, having each tagged 24 fish, while Barry Starling and Reece Cliff are closely behind. I’d also like to congratulate Jordan Timms, Stanley Aardenburg, Casey George and Tony McIlroy for tagging their first fish over the past six months. Great work to all these anglers plus everyone else who continues to tag. A big thank also to all those anglers that have been putting the time in but haven’t yet been rewarded with a fish.

Angler	Number tagged
Tim Murrell	116
Mark Hadden	55
Michael Gordon	50
Aron Coleman	36
Shane Murphy	31
Bodhi Pannenburg	24
Shane Lowery	24
Shane Murrell	24
Barry Starling	23
Reece Cliff	22
Nigel Telford	20
Steve Kovacevic	18



Jordan Timms was pleased to tag his first Mulloway since recently joining the program. This 58.5 cm was caught from the Barwon River in January.



One of the fish recently tagged in the Yarra is this 67cm fish, caught by Shaun Willis and Ben Thomas.



Brad Spiden has been involved in the program since the beginning and in this time, he has spent countless hours fishing the Yarra, Patterson, Barwon and Glenelg rivers. In March, he tagged this 115 cm Mulloway from the Yarra River. Congrats on the new PB!



Steve Kovacevic has managed to tag four Mulloway in the Yarra River since the start of the year, this being the largest at 74 cm.

Largest Mulloway Tagged as of July 2020

Location	Angler	Total Length (cm)
Patterson River	Reece Cliff	120
Yarra River	George Gabriel	118
Glenelg River	Tim Murrell	110
Barwon River	Jaryd McDowall	101
Moyne River	Tony McIlroy	98
Hopkins River	Shane Murphy	97
Vic Marine waters	Dom Gillot (Western Port Bay)	90
South East SA	Shane Murrell / Bodhi Pannenburg	84

Recaptures

Since the last newsletter in October last year, we have recorded a further 40 recaptures, bringing the total to 116. This means that 18% of the overall 650 fish tagged have been recaptured. Recent recaptures have mainly been fish tagged and later caught in the Glenelg River. Four recaptures have been Mulloway tagged and later recaptured in the Patterson River, almost doubling the number of recaptures for this system.

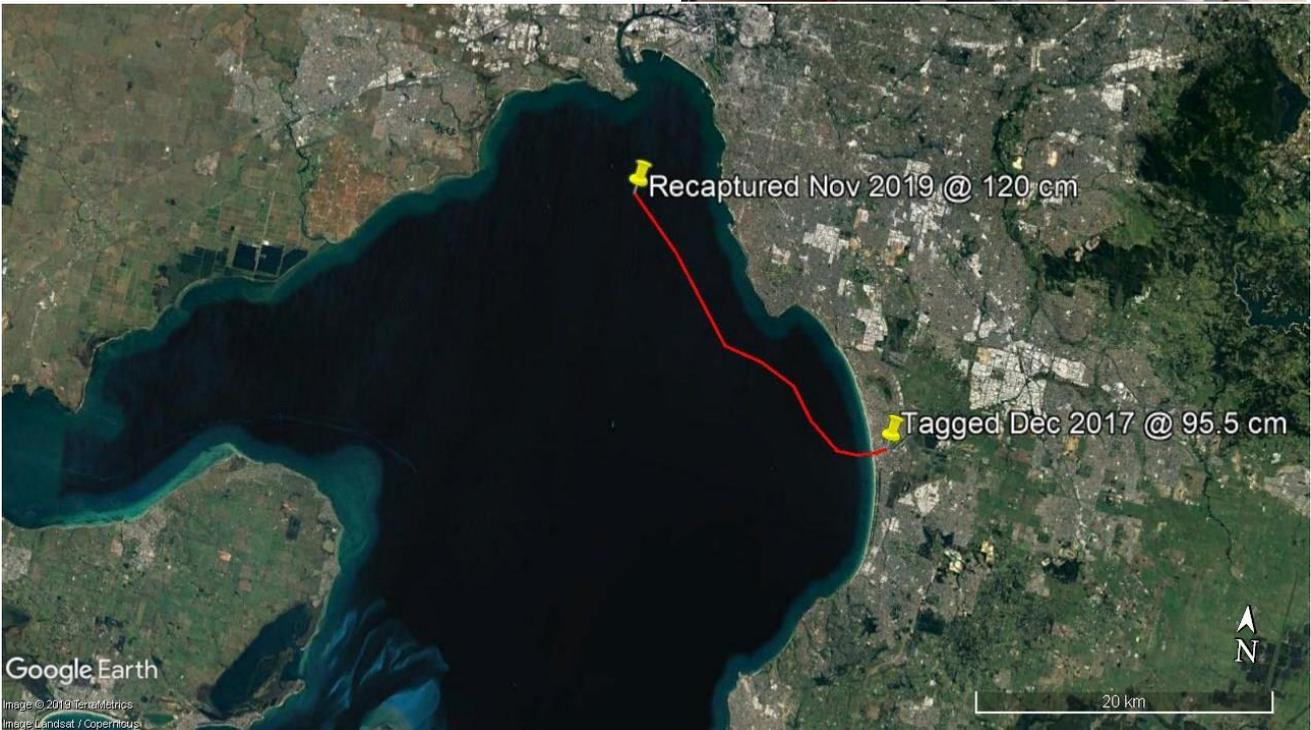
Table 1. Summary of Mulloway recaptures, according to the different movement patterns.

Movement type	Region/river	Recaptures		
		Pre Nov 2019	Recent	TOTAL
1. Within estuary	Glenelg River	42	30	93
	Hopkins River	4	2	
	Moyne River	1	1	
	Patterson River	5	4	
	Yarra River	3	1	
2. Between estuary	Patterson River → Yarra River (mouth)	2		2
3. Estuary to ocean	Glenelg River → South East SA beaches (Port Mac)	3		5
	Patterson River → Port Philip Bay		1	
	Barwon River → Coorong beach SA	1		
4. Ocean to estuary	South East SA (Port Mac) → Glenelg River	9		12
	Kingston SE SA → Coorong beach SA		1	
	Barwon Coast → Barwon River	2		
5. Ocean	South East SA (Port Mac) → South East SA (Port Mac)	1		1



In December last year, a 50 cm tagged Mulloway was caught near the Tauwicheere Barrage at the northern end of the Coorong. The fish was tagged only 53 days earlier by Dylan Broad at 28 Mile Crossing near Kingston SE in SA, some 150 km south. The Mulloway was originally tagged at 40 cm and grew a whopping 10 cm in the short time it was at liberty. This is the first tagged Mulloway we have seen recaptured inside the Coorong, which is quite exciting.

While we have seen two Mulloway tagged from the Patterson River turn up at the mouth of the Yarra River (i.e. Williamstown, Newport), we have now also seen a Mulloway tagged from the Patterson be recaptured in Port Phillip Bay. The fish was tagged at 95.5 cm by Shane Swain and Shaun Mulcahy in December 2017 and was in fact the very first fish to be tagged from the Patterson River. In November last year, Jim Pascoe was aboard his boat near Faulkner Beacon when he landed the same tagged Mulloway. The fish had been at liberty for 716 days (third longest on record- see later), and in this time covered over 26 km. At 120 cm, the fish had grown 24.5 cm which equates to a growth rate of 0.034 cm per day. Jim noted some white liquid (milt) on the deck of his boat after releasing the fish, which confirms the fish was a male in breeding condition. This suggests the Mulloway had migrated to the Bay to undergo spawning.



A 76 cm Mulloway tagged from the Hopkins in January last year by Andrew Primmer, was recaptured

by Gary O'Dowd at the start of this year in a similar location. The Mulloway had grown 14 cm to reach 90 cm. The photos below show a 'before' and 'after'.



There have only been three recent recaptures, reflecting the state-wide fishing bans. A Mark Hadden tagged a 53 cm in April last year down the mouth, and it was recaptured by Zac Carpenter (below) in a similar location at the start of the month. The fish had only grown 8 cm in 426 days.



Another recent recapture was recorded by Craig Philp from Spot On Fishing Tackle Mt Gambier. He caught a 105 cm tagged Mulloway at Dry Creek, which had been tagged almost exactly a year ago by Rob Jeffery at Taylors straight. During the year it was at liberty, the fish only grew 8 cm which is again, very minimal growth. Both Zac and Craig mentioned there was lots of weed covering the tag making it difficult to spot. A nice reminder to try and remember to check for a tag when you catch a Mulloway.

Record distances travelled

The table below summarises the record distances travelled by a tagged Mulloway. By far the longest distance swimmer has been a Mulloway tagged in the Barwon River which travelled to the Coorong in SA, covering 700 km. The next largest distance was a Mulloway tagged at Kingston (at the southern end of the Coorong) which travelled 144 km further west to the mouth of the Murray River. Other notable distances include three Mulloway tagged in the Patterson River which made their way across to Williamston (40 km), Newport (37 km) and Faulkner Beacon (26 km). Back in the west, those fish that have moved between Browns Bay/Green Point (near Port MacDonnell) in SA and the Glenelg River (or vice versa) account for five of these record distances travelled (ranging 19 to 33 km). Finally, a Mulloway tagged at the mouth of the Glenelg travelled 26 km upstream to Sapling Creek which is the highest movement we've observed inside a river system.

Tag #	Distance (km)	Details
VIC0023	700	Barwon River estuary → the Coorong beach (Tea-Tree Crossing)
VIC0983	144	Kingston SA (southern Coorong) → Murray River mouth
VIC0541	40	Patterson River → Williamstown
VIC0672	37	Patterson River → Newport
VIC0463	33	Browns Bay SA → Glenelg River at Sandy waterhole
VIC0132	26	Patterson River → Port Phillip Bay (near Faulkner beacon)
VIC0222	26	Glenelg River mouth → Glenelg River at Sapling Creek
VIC1362	25	Browns Bay SA → Glenelg River at Donovans
VIC0896	24	Glenelg River town bridge → Glenelg River at Sapling Creek
VIC0527	23	Browns Bay SA → Glenelg River at Taylors straight
VIC0526	21	Browns Bay SA → Glenelg River at Taylors straight
VIC0624	20	Glenelg River mouth → Glenelg River at Hutchessons
VIC0623	19	Glenelg River mouth → Green Point, SA
VIC0031	18	Geelong beach area → upper Barwon River

Record times at liberty

The tables below summarises the record times at liberty for tagged Mulloway, and the growth that occurred during this time. The longest time at liberty we've observed has been by a Mulloway tagged from the Moyne River that was recaptured 754 later. Being a permanently open system, the fish could have travelled anywhere during this time, but interestingly, it was recaptured only 2 kilometres from where it was tagged two years on! Another Mulloway tagged and recaptured in the Glenelg River was at liberty for just shy of 2 years and showed similar amounts of growth (23 cm). In comparison, another fish tagged and recaptured in the Glenelg that was at liberty for just 39 days less, only grew 14.5 cm. These variable growth rates are consistent with findings from our age and growth studies.

Tag #	Days	Details	Growth	Growth rate
VIC0403	754	Moyne River → Moyne River	24	0.032
VIC0468	742	Glenelg River mouth → Glenelg River mouth	23	0.031
VIC0132	716	Patterson River → Port Phillip Bay (near Faulkner beacon)	24.5	0.034
VIC0552	703	Glenelg River mouth → Glenelg River mouth	14.5	0.021
VIC0463	515	Browns Bay SA → Glenelg River, Sandy waterhole	21	0.041
VIC0391	512	Glenelg River, town bridge → Glenelg River, Donovans	8	0.016
VIC1087	473	Glenelg River, Taylors straight → Glenelg River, Donovans	5	0.011
VIC0215	476	Browns Bay SA → Glenelg River, Sandy waterhole	17	0.036
VIC0222	440	Glenelg River mouth → Browns Bay SA	17	0.039
VIC0527	434	Browns Bay SA → Glenelg River, Taylors straight	17.5	0.040
VIC0672	427	Patterson River → Newport	14	0.033

Thanks again for all your efforts and stay safe everyone! If you have any comments or questions, please get in touch – see below.

Contacts

Phone: 0439 034 390; **Email:** lauren.brown@ngt.org.au

Post: PO Box 354, Warrnambool, VIC 3280

f Facebook: <https://www.facebook.com/groups/mullowaycitizenscience/>
<https://www.facebook.com/groups/MullowayTaggersVictoria/>

Web: www.natureglenelg.org.au