FEDERAL SUBSISTENCE BOARD

SPECIAL ACTION MEETING

TELECONFERENCE - ALASKA May 1, 2020

MEMBERS PRESENT:

Anthony Christianson, Chairman Rhonda Pitka Chad Padgett, Bureau of Land Management Greg Siekaniec, U.S. Fish and Wildlife Service Joshua Ream, National Park Service Gene Peltola, Bureau of Indian Affairs David Schmid, U.S. Forest Service

Ken Lord, Solicitor's Office

Recorded and transcribed by: Computer Matrix Court Reporters, LLC 135 Christensen Drive, Second Floor Anchorage, AK 99501 907-243-0668; sahile@gci.net

Computer Matrix, LLC 135 Christensen Dr., Ste. 2., Anch. AK 99501 Fax: 907-243-1473

Phone: 907-243-0668

```
Page 2
                      PROCEEDINGS
 2
 3
                   (Teleconference - 5/1/2020)
4
5
                     (On record)
 6
7
                     (Operator instructions)
8
9
                     MR. DOOLITTLE: Thank you very much,
10
     Operator. Welcome everybody this afternoon. As usual,
11
     as we did in the last few meetings is I will at the
     discussion of the Chair after I get a preliminary roll
12
     call to make sure that we have folks online we will go
13
14
     to the agenda after that and turn it over to the Chair.
15
16
                     As a reminder, this meeting is for
17
     Fisheries Temporary Special Action Request 20-01, 02
18
     and 03, related to Kuskokwim salmon. So we have three
19
     parts to the agenda. One is to review and adopt the
20
     special action, address the special and adjourn.
21
22
                     I'll start right now to see if we have
23
     a Board and other folks that are imperative to this
24
     process that are online right now in the speaker's
2.5
     room. I'll start with National Park Service, Joshua
26
     Ream.
27
28
                     MR. REAM: Good afternoon, everyone.
29
     This is Joshua Ream and I am representing the National
30
    Park Service on behalf of Don Striker today. Don had a
31
     compulsory meeting that overlapped and he wishes he
32
     could be here.
33
34
                     Thank you.
35
36
                     MR. DOOLITTLE:
                                     Thank you, Josh.
37
38
                     Bureau of Land Management. Is Chad
39
     Padgett online.
40
41
                     MR. PADGETT: I am.
                                          Thank you, Tom.
42
43
                     MR. DOOLITTLE:
                                     Thank you, Chad.
44
45
                     U.S. Fish and Wildlife Service, Greg
46
     Siekaniec online.
47
48
                     MR. SIEKANIEC: Yes, Tom, I am online.
49
     Thank you.
50
```

```
Page 3
                     MR. DOOLITTLE: Okay. Thank you, Greg.
 1
2
 3
                     U.S. Forest Service David Schmid, are
4
     you online.
 5
 6
                     MR. SCHMID: Yeah. Good afternoon,
 7
           I'm here.
     Tom.
8
9
                     MR. DOOLITTLE: Okay. Thank you, Dave.
10
11
                     Bureau of Indian Affairs, Gene Peltola,
12
     are you online.
13
14
                     MR. PELTOLA: Ii-I. Yes.
15
16
                     MR. DOOLITTLE: Okay. Good, Gene.
17
     Good to hear your voice.
18
19
                     Public Member Rhonda Pitka.
20
21
                     MS. PITKA: Hi, I'm here.
22
23
                     MR. DOOLITTLE: Great, Rhonda.
24
25
                     Public Member Charlie Brower, are you
26
     on the phone.
27
28
                     (No response)
29
30
                     MR. DOOLITTLE: No Charlie.
31
32
                     Chairman Anthony Christianson, are you
33
     online.
34
35
                     (No response)
36
37
                     MR. DOOLITTLE: Okay. We'll wait for
38
     Charlie and Tony to come online.
39
40
                     Ken Lord, are you online.
41
42
                     MR. LORD: Hey, Tom. I'm here.
43
44
                     MR. DOOLITTLE: Okay, Ken. Any other
45
     counsel? Mike Routhier, are you online?
46
47
                      (No response)
48
49
                     MR. DOOLITTLE: No Mike.
50
```

5/1/2020

```
Page 4
                     MR. REAKOFF: Jack Reakoff here, WIRAC.
 1
 2
 3
                     MR. DOOLITTLE: Okay, Jack. I'll get
4
     to the RACs here in a bit, but thank you, sir.
 5
 6
                     Steve Wackowski, are you online.
 7
 8
                     (No response)
9
10
                     MR. DOOLITTLE: No Steve.
11
12
                     Ben Mulligan.
13
14
                     MR. MULLIGAN: Sorry, Tom. I'm here.
15
16
                     MR. DOOLITTLE: Is that you, Ben?
17
                     MR. MULLIGAN: Ben is.
18
19
20
                     MR. DOOLITTLE: Alrighty, Ben, thank
21
     you. We have the State of Alaska here. Wonderful.
22
23
                     The RAC Chairs.
24
2.5
                     Alissa Rogers, you on.
26
27
                     MS. ROGERS: Present.
28
29
                     MR. DOOLITTLE: Thank you, Alissa.
30
     Jack Reakoff, I know you're online.
31
                     Is Frank Harris online?
32
33
34
                     MR. HARRIS: Good afternoon. I'm here.
35
36
                     MR. DOOLITTLE: Pippa Kenner, are you
37
     online?
38
39
                     MS. KENNER: Yes.
40
41
                     MR. DOOLITTLE: Okay. Good. Let me
42
     double check here. We're good.
43
44
                     I'm going to go back to Chairman
45
     Christianson.
                    Are you online yet?
46
47
                      (No response)
48
49
                     MS. DEATHERAGE: Tom Doolittle, this is
50
```

```
Page 5
     Karen Deatherage just for the record.
 2
 3
                     MR. DOOLITTLE: Yes. Hi, Karen.
4
     know Eva was on as well. Great. Thank you very much,
 5
     Karen. I'm going to give it a few minutes and text the
     Chair and Mr. Brower. So please provide a little
 7
     patience to the process and we'll get back to you.
8
     Thank you.
9
10
                     (Pause)
11
12
                     OPERATOR: Excuse me. Mr. Christianson
13
     has joined in.
14
15
                     MR. DOOLITTLE: Operator, has Chairman
16
     Anthony Christianson or Tony Christianson joined in?
17
18
                     CHAIRMAN CHRISTIANSON: I'm here. I'm
19
     here, Tom.
20
21
                     OPERATOR: Yes, sir, he has joined.
22
23
                     MR. DOOLITTLE: Great. Thank you, Mr.
24
     Chair.
25
26
                     Steven Wackowski, are you online now?
27
28
                     OPERATOR: At this time, sir, he has
29
     not joined.
30
31
                     MR. DOOLITTLE: Okay. Mr. Chair, this
     is Tom. We do have a quorum of the Board. Mr. Brower
32
33
     is absent, but we do have seven of eight members of the
34
     Board here for this particular action. At this time if
35
     you want to give a few more minutes to Charlie, I'll
     leave that to your discretion. At your discretion have
36
     me do the roll call as well, Mr. Chair.
37
38
39
                     Thank you.
40
41
                     CHAIRMAN CHRISTIANSON: Yep. I would
42
     like to give Charlie another minute or two and then
43
     we'll go ahead and do roll call for attendance and then
44
     get started with business.
45
46
                     Thank you, Tom.
47
48
                     MR. DOOLITTLE: Thank you, Mr. Chair.
49
50
```

SPECIAL ACTION MEETING

```
Page 6
1
                     (Pause)
 3
                     CHAIRMAN CHRISTIANSON: All right, Tom.
4
     It looks like we'll go ahead and get started with the
5
     meeting today. I appreciate everybody taking the time
     to call in for the Special Action Request today. With
7
     that, Tom, I'll turn it over for roll call.
8
9
                                     Thank you, Mr. Chair.
                     MR. DOOLITTLE:
10
11
                     We'll start with National Park Service,
12
     Joshua Ream.
13
14
                     MR. REAM: Yes, I'm present.
15
     you.
16
17
                     MR. DOOLITTLE: Bureau of Land
18
     Management, Chad Padgett.
19
20
                     MR. PADGETT: Present. Thanks, Tom.
21
22
                     MR. DOOLITTLE: You betcha.
23
24
                     Fish and Wildlife Service, Greg
2.5
     Siekaniec.
26
27
                     MR. SIEKANIEC: Yes, Tom, present.
28
     Thank you.
29
30
                     MR. DOOLITTLE:
                                     Thank you, Greg.
31
32
                     U.S. Forest Service, David Schmid.
33
34
                     MR. SCHMID: I'm present, Tom.
35
36
                     MR. DOOLITTLE:
                                     Thank you, Dave.
37
38
                     Bureau of Indian Affairs, Gene Peltola.
39
40
                     MR. PELTOLA: Present and accounted
41
     for.
42
43
                     MR. DOOLITTLE:
                                     Thank you.
44
45
                     Public Member Rhonda Pitka.
46
47
                     MS. PITKA: Yes, I'm here.
48
49
                     MR. DOOLITTLE: All right, Rhonda.
50
```

```
Page 7
     Thank you.
 2
3
                     Chairman Anthony Christianson.
5
                     CHAIRMAN CHRISTIANSON: Yes, I'm here.
 6
     Thank you.
 7
8
                     MR. DOOLITTLE: Last but not least,
9
     Charlie, are you online?
10
11
                     (No response)
12
13
                     MR. DOOLITTLE: With no answer with
     Charlie, we have seven of eight board members and we do
14
15
     have a quorum, Mr. Chair. We do have some sad news,
     Mr. Chair, so I'll let you officiate that sad news for
16
17
     the Federal Subsistence Program.
18
19
                     CHAIRMAN CHRISTIANSON: Yes, thank you
20
     for the introduction to that, Tom. At this time we
21
    just wanted to have a moment of silence. We had some
22
     real sad news, you know, Ray Collins passing away.
23
     served 26 years on the Western Interior RAC since its
24
     inception in 1993 and he also participated as an
25
     upriver advisor for I believe that long on the
26
     Kuskokwim River as a management working group member.
27
     He was from McGrath. He was a renowned language
28
     scholar and a dearly loved member of the community.
     appreciate Tom filling me in on the history and the
29
30
     background on him.
31
32
                     Today, if we could have a moment of
33
     silence and prayer for the family and recognizing his
     service to the Subsistence Program, I'd appreciate
34
35
     that. If anybody else has some words they'd like to
     share or express, I'd open the floor for that as well.
36
37
38
                     (Moment of silence)
39
40
                     CHAIRMAN CHRISTIANSON: I appreciate
41
     that moment of silence. Again, I'd open up the floor if
     any Board members or Staff would like to say a few
42
43
     words.
44
45
                     MR. REAKOFF: Mr. Chairman. Jack
46
     Reakoff, Chair of the WIRAC.
47
48
                     CHAIRMAN CHRISTIANSON: Yes, you've got
49
     the floor, Jack. Thank you.
50
```

MR. REAKOFF: When I received the news this morning, I wrote this for my RAC members. Ray Collins, Pollock Simon and I were on the first WIRAC meeting. The Alaska Supreme Court ruled Alaska could not manage for a rural preference in 1989 and the State of Alaska refused to sit back or have the people vote for a rural preference. The Board of Game never had managed for a truly rural preference. Only if subsistence did not interfere with sport or commercial use.

10 11 12

13

14 15

16

17

4

5 6

7

8

9

The Federal government attempted to provide a rural preference in 1990 after negotiations with the State of Alaska failed. The Alaska Federal agencies under the lead of the Regional Director set up a pre-Board of Regional Directors to set temporary regulations. The temporary regulations did not have Council comment.

18 19 20

21 22

23

24

25

26

27

Some people, like Ray and I, were contacted to hear grievances or comments on proposals to address subsistence uses in our areas. We were contacted in 1993 and asked if we would serve because of work we had done with the ACs and the Federal pre-Board. The State had done such a poor job of managing rural subsistence, there was something like 280 wildlife only proposals. We did not manage fisheries at that time. After Katie John we did.

28 29 30

31

32 33

34

The very first WIRAC meeting was in McGrath. There was a huge number of BLM, Fish and Wildlife, National Park Service, OSM Staff present to see and hear what is subsistence. Ray was selected by the Council as the first Chair of the RAC.

35 36

37

38

39

Ray was a solid RAC member. traveled as long as he could. He stayed on the phone to participate in meetings he couldn't travel to. was great we could meet in McGrath and be with him as he retired last fall in 2019.

40 41 42

43

44

45

He fought for sound fish and wildlife management. Always well thought out and informative commentary. Many historical, cultural comments that are in our years of transcripts. Always peaceful. Never raised his voice too loud.

46 47 48

I knew Ray's time was short the last time we saw him. He did the best he could for the

Phone: 907-243-0668

```
Page 9
     resources and the people of the Western Interior
     Region. He fought the good fight with words of
     integrity to his last breath.
4
5
                     Well done, Ray. Well done. Rest in
 6
     peace.
 7
 8
                     Thank you, Mr. Chair.
9
10
                     MS. KENNER: Thank you, Jack. This is
11
     Pippa.
12
13
                     CHAIRMAN CHRISTIANSON: Thank you for
14
     that too as well, Jack, from the Chair here. I just
15
     appreciate those kind words and I'm glad you took the
16
     time to honor him today. Truly appreciate that.
17
18
                     Anybody else would like to share some
19
     condolences or comments. The floor is open.
20
21
                     (No comments)
22
23
                     CHAIRMAN CHRISTIANSON: All right.
24
     Hearing none. I appreciate everybody taking their time
     to go ahead and honor their memory of Ray. We'll go
25
26
     ahead and start with the order of business for the day
     and call this meeting to order.
27
28
29
                     Tom, I'll just go ahead and ask you to
30
    have Staff just detail out what we're up against today.
31
32
                     Thank you.
33
34
                     MR. DOOLITTLE: Thank you, Mr. Chair.
35
     Today the Staff will outline and we'll start with the
     Staff analysis from Frank Harris and Pippa Kenner on
36
37
     Fishery Temporary Special Action FSA20-01, 02, 03 all
     related to Kuskokwim salmon. That's where we'll start,
38
39
     Mr. Chair.
40
41
                     CHAIRMAN CHRISTIANSON: Thanks, Tom.
42
     I'll go ahead and ask the Staff to present the
43
     information.
44
45
                     Thank you.
46
47
                     MS. KENNER: Okay. I've been asked.
     Hello, members of the Board. My name is Pippa Kenner
48
49
     and I'm an anthropologist at the Office of Subsistence
50
```

Management. With me today is Frank Harris, a biologist at OSM. We're here today to provide an overview of Fisheries Temporary Special Action Request 01, 02 and 03 related to the Kuskokwim chinook salmon subsistence fishery.

5 6 7

8

9

10

11 12

4

First we'll describe the request. Special Action Request 01 was submitted by the Akiak Native Community Council on February 21st. It asked to close Federal public waters of the Kuskokwim River drainage to the harvest of chinook salmon except by Federally qualified subsistence users possessing a community harvest permit between June 1 and July 1;

13 14 15

16

17

Reduce the pool of eligible harvesters based on an Alaska National Interest Lands Conservation Act or ANILCA Section 804 Subsistence User Prioritization that was implemented in 2017;

18 19 20

21 22

23

And consult with 33 communities named in the 2014 OSM Section 804 analysis to establish an appropriate harvest allocation of chinook salmon to be distributed among communities within the Kuskokwim River drainage.

24 25 26

27 28

29

30

31 32

33

The second Special Action Request was submitted by the Organized Village of Kwethluk on February 26th. They asked to close Federal public waters of the Kuskokwim River drainage to the harvest of chinook salmon except by Federally qualified subsistence users between June 1st and July 1st; and to reduce the pool of eligible harvesters within the Kuskokwim River drainage based on an ANILCA Section 804 Subsistence User Prioritization analysis.

34 35 36

37

38

39 40

Both of these proponents state that chinook salmon subsistence harvest within the Kuskokwim River Drainage has declined precipitously within the last decade. The last time the amount necessary for subsistence was achieved for chinook on the Kuskokwim River was in 2009.

41 42 43

44

45

46

The harvest outlook for chinook salmon for 2020 should trigger the responsibility of the Board to restrict the taking of chinook salmon for subsistence uses on public lands of Alaska per the responsibilities specified in Section 802 of ANILCA.

Phone: 907-243-0668

47 48

The proponents continue that failing to

first restrict chinook salmon harvest to Federally qualified subsistence users forgoes the Board's additional responsibility to restrict within subsistence users when necessary as mandated in Section 804 of ANILCA.

5/1/2020

5 6 7

8

9

10

11 12

4

The third Special Action Request submitted by Lamont Albertson, who is now living in Anchorage formerly of Aniak, on February 26th and it requests the following: Close Federal public waters of the Kuskokwim River drainage to the harvest of chinook salmon except by Federally qualified subsistence users at the beginning of the 2020 chinook salmon run;

13 14 15

16

Conduct an ANILCA Section 804 Subsistence User Prioritization to reduce the pool of eligible harvesters;

17 18 19

20

21

22

23

24

25

26

27

30

31 32

33

34

And finally to request that the Federal in-season manager continue to implement emergency special actions to ensure that conservation mandates under Section 815(1) and (3) of ANILCA by following the model from 2019, where the Federal in-season manager worked with the Kuskokwim River Inter-Tribal Fish Commission, the Alaska Department of Fish and Game, and other stakeholders to determine when harvest opportunities should be provided.

28 29

The proponent states that based on new information, including critical sources of uncertainty and the decade-long decline, there is little evidence to support a pre-season decision that the 2020 run of Kuskokwim chinook salmon will be sufficient to support the harvest demands of all users without endangering the health of chinook populations.

35 36 37

38

39

40

41

The proponent lists four risk factors, three of which function as drivers of decline, negatively impacting the abundance and/or productivity of the stocks. The first factor he describes is risks to stock diversity from high harvest rates are not currently accounted for.

42 43 44

45

46

47

48

He continues: The mandate for protecting population diversity is found in Title III of ANILCA and in the Alaska Board of Fisheries, Sustainable Salmon Policy. A new paper by Connors et al (2019) identifies several Kuskokwim chinook salmon sub-stocks that are currently less productive and

Phone: 907-243-0668

therefore at risk of unintentional overharvest under higher exploitation rates within the mainstem mixed-stock fishery.

4 5

6

7

8

9

10

11 12

13

Another factor. Significant decline in body size and caloric value of chinook salmon is not currently accounted for: The observed decline in the body size and the reduced proportion of female Kuskokwim River chinook salmon across the time series results in a decline in both the number and average size of spawned eggs and reduced caloric value of the smaller size of subsistence salmon harvested in recent years requires additional chinook salmon to provide the same caloric value from thirty years ago.

14 15 16

17

18

19

20

21 22

23

24

25

26

30

31 32

The third point he makes is the impacts of climate driven heat stress on migrating salmon. During heat events in recent years freshwater temperatures have significantly exceeded species thresholds (above 18 degree Celsius or 65 degrees Fahrenheit). This is known to cause heat stress and mortality of migrating salmon, including before spawning, or to die with eggs retained, which can bias biological reference points. Heat stress is an especially problematic driver of decline because much of its impact on migrating salmon likely occurs after the fish have been counted.

27 28 29

Finally, the fourth point the proponent makes has to do with critical sources of uncertainty fuel risk. The Kuskokwim chinook salmon preseason forecast and in-season management operates under a very high degree of uncertainty, which translates into risk.

37

38

39

40

41

42 43

The proponent does not contest the methods used to estimate the 2019 total run and escapement numbers; however, he is concerned that the true uncertainty associated with the performance of the prior year forecast method when applied to the Kuskokwim chinook salmon data set may actually be significantly higher than the level of uncertainty being assigned to it. This is an important question to be evaluated.

44 45 46

47

48

Due to its high degree of uncertainty, use of the 2019 total run estimate by the Federal Subsistence Management Program to justify 2020 preseason or any in-season harvest management decisions

Phone: 907-243-0668

poses unacceptably high risks to the viability of populations and the harvest needs of the priority consumptive uses.

I'm going to move on now to things that have happened since we've received these Special Action Requests. A public hearing was held on March 16, 2020, at the U.S. Fish and Wildlife Service, Regional Office in Anchorage, Alaska. Seventeen individuals identified themselves at the start of the teleconferenced meeting, with 11 people and organizations testifying.

5/1/2020

The summary of the public hearing begins on Page 20 of the analysis. I'm going to offer a brief summary. Most testifiers were generally supportive of the closure of Refuge waters to the harvest of chinook salmon except for the rural residents identified in the Section 804 subsistence user prioritization.

Testimonies included statements such as sacrifices made by local communities in order to rebuild the chinook salmon run have been very successful. The Board should continue to listen to local people and continue these rebuilding efforts. Without the Board's action fishing will be open to all uses and this is not why we have sacrificed harvest for five years.

Three testifiers opposed these special action requests, specifically a closure to the harvest of salmon by non-subsistence uses. ADF&G voiced their opposition in a letter to the Board, which is included as Appendix F. Another testifier described fishing restrictions that have been implemented since 1999 and the difficulty they have imposed on subsistence users.

New information has resulted in more reliable forecasts of run size allowing ADF&G to manage protectively this year. And the fishery should be closed only if warranted based on in-season indicators.

Thanks. Orville, would you like to present the tribal and corporation consultation summary now?

MR. LIND: Yes. Can everyone hear me?

CHAIRMAN CHRISTIANSON: Loud and clear,

Orville. You've got the floor.

2 3 4

MR. LIND: Thank you, Mr. Chairman. Board members, RAC Chairs. Orville Lind, Native Liaison.

5 6 7

8

9

10

11

I'm going to go ahead and do a brief overview of the tribal consultation and ANCSA consultation held on April 16th. Mr. Williams stated that the chinook salmon have not recovered and this is not the time to put additional risk on chinook salmon. As you heard, they have sacrificed over five years.

12 13 14

15

16

Subsistence protections under ANILCA should be upheld by the Board. The rebuilding returns a purpose of people having enough fish to continue subsistence uses.

17 18 19

20

21

22

23 24

25

26

They've seen small king salmon last year and they have seen impact of climate change and heat stress. They saw an impact of that last summer. There's a risk to stop diversity from high harvest rates also. They did mention that in 2013 a mismanagement occurred and they want to avoid that same thing again. It turned out that the outcome was lower on record and they don't want to see that happen again.

27 28 29

30

31

32 33

34

He does applaud the Yukon-Kuskokwim Delta Council who supported all three special actions and the Organized Village of Kwethluk and Lamont Albertson also. Mr. Lekander also stated that rebuilding stocks takes a while because of the heat stress inriver and bycatch in the oceans. They don't want a repeat of 2013.

35 36 37

38

39 40

41

Also he said he fished on the river with -- since he's been on the river he fished with cotton nets and wooden corks, meaning that he'd done that a long time ago. They save king salmon. to eat king salmon and they need it for themselves for subsistence.

42 43 44

45

There were no reds at the time they were growing up in this area. He supports the special actions.

46 47 48

Mr. Jordan also stated that he had a letter written in March from ONC subsistence committees

Phone: 907-243-0668

and that these comments on all three special actions. One, ONC does not agree with 804 recommendation. Number two, it would be complicated and difficult to enforce. Number three, if the chinook salmon in-season does not meet the ADF&G predictions, then an 804 should be enacted until chinook salmon estimates are met.

Mr. Lekander also said he did not vote on that letter. Mr. Jordan said that Robert voted against the rest of the members, disagree.

 After all the special actions were read again, Mr. Williams stated that the special action from Lamont there's a lot of new detail information and it would justify the other two special actions and said that Akiak fully supports those special actions.

 Mr. Lekander also said he supported that. They put a moratorium on moose and look what happened. There's a lot of moose now. Too many risk factors on salmon; heat stress and bycatch, the size of fish getting smaller. There are people there in Bethel when they open up there's so many people that it's like a certain thing like a curtain going down on the river open to everybody and it's detrimental to the kings.

Mr. Kameroff also supports the special actions and the salmon population is still at risk, he says. It continues to do like we did last year. Each year that goes on we'll see more and more rebuilding and salmon conservation. We are learning more. Then he thanks the biologists for all their work.

Mr. Gillikin also mentioned he had questions on all three special actions and his council has taken a position at the time and he's waiting for additional information from OSM in the form of an analysis so they can make additional comments.

The lack of information in the form of an analysis has been a real challenge for them to provide any information to their board so they could make a decision.

I'll move on to -- Mr. Williams again says in recent times the subsistence needs, the ANS defined in State regulation have not been met in recent years and harvest has been far below the 80,000 fish harvest range to meet our needs on the river. He

appreciates the people sacrificing over these years, but they're running out of fish and he indicated himself before the winter is over. They are supplementing by other species, pike fishing and whitefish.

5 6 7

8

9

10

4

They're actually feeling very nervous in that they continue to see a countless number of years without risking the chinook salmon, then we would see fewer special action requests when they have enough numbers to go by.

11 12 13

14

15

16

17

18

19

Mr. Decossas said that -- there was a question asked about any comments related to escapement objectives. Mr. Decossas said remember the document sent to you that decided to view results using BayesTool and a 50/50 shot at meeting the escapement goals of 95,000 fish. The Fish Commission wanted an escapement target of 110,000. Mr. Gray agreed that it was within the risk tolerance.

20 21 22

23

24

25

26

Mr. Gillikin also asked about the escapement goal and that's the management strategies, State management strategies and has the Fish and Wildlife Service discussed strategies they may employ if they took over the fishery. Mr. Decossas said we're having discussions on that.

27 28 29

30

31

32 33

34

35

36

Moving on to again another question by Mr. Gillikin, do you agree that escapement of upper end of goal can jeopardize chinook salmon stock. Mr. Gillikin said that concerning sockeye systems also, we're talking about chinook salmon, and Mr. Gillikin said based on the spawner recruit model, if we start exceeding the escapement goal ranges, it will affect yield and this point is lost if we have these in place. The data says what it says and it is pretty strong.

37 38 39

40

41

42 43

44

Age at maturity, loss of age classes, egg production, and models just came out. Over-escapement actually reducing yield looked like yields from the 2013 run. There was an increased number of fish returning based on that run. If we are reaching the upper end of the objectives, then we are actually shooting ourselves in the foot.

45 46 47

48

If we meet escapement in the mid or upper range, that would accommodate escapement goals in tributaries and weak stock protections.

Phone: 907-243-0668

Mr. Decossas also related to Conners as an example of much recent researches according to that paper subsistence needs could be met. Purely shooting for a high escapement only necessary if combined harvest is over 150,000.

5 6 7

8

9

10

11 12

4

1

There's a tradeoff in biodiversity and low overall harvest rate is more important than overall escapement goal in meeting tributary goals if hitting upper end escapement goal. There's been a discussion to move lower end of goal up so we can reasonably be sure that escapement goals met and the tributaries are protected.

13 14 15

16

17 18

19

20

21 22

23

24

25

26

Ms. Peltola mentioned that the Fish Comm is comprised of 33 communities and seven tribes and there are seven units in the Commission. selects its own member to represent them on executive council. There are four in-season managers representing different areas of the river and they're elected by all the commissioners, plus an elder, who also attends meetings. These are individuals who are qualified to discuss long-term trends and changes that they may have seen over the years in their lifetime, sometimes having witnessed these changes firsthand. They pretty much see everyone and also they're all saying they're smaller salmon.

27 28 29

30

31

32

33

34

35

36

37

She stated she knows that the Kuskokwim is unique in those terms. In the Kuskokwim a lot of four-year-olds are returning. People remember giant eight-year-olds and large seven and six-year-olds. They're also looking at the effects on subsistence in future years. The Yup'ik way is to take in gratitude when they come back in good numbers. That's what they talk about. They're learning that the fish are smaller and there are fewer females, fewer eggs and smaller egas.

38 39 40

41

42 43

44

45

46

47

48

Mentioned that we have not met our subsistence needs since 2011. The last year's estimated 40,000 fish harvested was the best in eight years. The word escapement is a loaded word, like we lost something. They know the fish didn't escape. They're multiplying. ADF&G's highest recorded run was 300,000 fish. She said she would not argue the theory that too many fish can go up and deplete the oxygen. Too many in small spaces. The people say that the river doesn't smell the way it used to. The locals

Phone: 907-243-0668

recognize the smell of a healthy system. People on the river say it's true, over-escapement can happen, but the current sizes are not a problem.

Red herring distractions, false arguments. Let's argue about this rather than something else. Mr. Lekander said in the old days he used to get 20 big ones and that would be enough. He says about 50 of them are smaller fish to get the same he's gotten before. He also mentioned that they were allocated one or two fish. That was something that really got to him. They say that this is the last frontier. He's hoping that his grandchildren will be able to fish in the future. He's been trying to conserve. Maybe in another 10 years he'll be telling his grandchildren that they used to catch them. Just like the whales out there they had to quit because they went extinct. I hope this doesn't happen to here. He's speaking about the salmon.

I'll go on to the actual ANCSA consultation. Hang on one second. Mr. Gillikin said he had some questions for Mr. Born on key management issues. At the Upper ANS he asked do you think subsistence needs would be met. Mr. Born replied that the harvest was 100,000 fish on closure, plus 6-inch mesh net. A typical year, if chum showed up after June 11th, it would be difficult to catch 100,000 fish.

Amounts needed is a fluid question. It's hard to quantify needs based on variables including changes in fish sizes concerning that ANS number. 100,000 fish is within the range of what the State has identified. Of course that would allow more opportunity to harvest as many fish as possible after June 11th.

Mr. Gillikin's next question to Fish and Wildlife says use the State's goal. Again, Mr. Born replied that this year's forecast is to be the same or bigger than last year. Escapement last year was significantly under the upper end of the escapement goal range.

If subsistence users collect 100,000 fish, this still leaves us 120,000 fish to escape above the upper end of goal and they'd be in good shape.

One more question from Mr. Gillikin was

do you have concerns of large escapements that might affect future productivity. Again, looking at the graph, first spawner relative to escapement. driving the cycle over and over. The State proposed fishing every other day until sufficient information is collected.

6 7 8

9

10

11 12

4

5

Again, Gillikin asked about what would be the Fish and Wildlife Service's strategy be. Mr. Born replied that the State approved the use of 6-inch mesh during front-end closures. This is a good harvest method to analyze the run strength. The Fish and Wildlife Service again did something similar to that.

13 14 15

16

17

18

19

20

21 22

He replied this is a big lunge, a big responsibility to monitor even if the State is in the management role we will still monitor, but they could liberalize if a run comes in big. They're cautiously optimistic. Mr. Gillikin asked another question, any conservation concern. Again, Mr. Born replied no concerns at this time, balanced conservation and harvest. Should be able to allow harvest and escapements.

23 24 2.5

26

27

28

29

30 31

The last question by Mr. Gillikin, given forecast, run size and the amount of harvest it looks like we are providing, do you have any conservation concerns. Mr. Born replied that this is a technical fishery question. I don't have conservation concerns at this time. The balance high end of escapement goal 120,000 and 100,000 harvest. size is still bigger than that.

32 33 34

35

36

37

Mr. Decossas replied in terms of -according to the research of the Kuskokwim area specific, it reports Conners' paper risk of diversity different than different areas of drainage. Also makes statements management could deal with issues.

38 39 40

41

42

43

44

45

46

Ms. Peltola stated that she has worked with dozens of tribes up and down the Kuskokwim River and from her perspective someone who has been on the river for decades hearing overescapement jeopardizes future productivity, that bothers her. More salmon on salmon grounds lay more eggs. They seem to be grasping at straws. Common logic, there will be at least one fish returning per spawner.

Phone: 907-243-0668

47 48 49

A study has referenced Nushagak River

sockeye not Kuskokwim River chinook. Fish and Wildlife Service Jim Boersma has done Kwethluk River research. Kwethluk River research is the second largest producer in the drainage. It is found every year out-migration of smolt in spring is 50 percent less than the year before.

6 7 8

9

10 11

12

13

14

15

16

4

5

The argument that fish are still needed on spawning grounds is counter intuitive. She said draped in science terminology, but it does not make sense to sample. On the river last year the majority four-year-olds spawned in 2015 or '16. She said the improvements that have seen direct results of Fish and Wildlife Service cooperating, working together with stakeholders. She says amazing proceeding has resulted and we want to continue the trend of large numbers returning.

17 18 19

20

21

22

23

Within the realm of our control is working with the Fish and Wildlife Service to get good harvest numbers. It is being -- trying to quantify clearly small fish, more fish not only needed for harvest but also needed on the spawning grounds. Chinook run size has been high, up to 400,000 fish.

24 25 26

27 28

29

30

31 32

35

36

37

She was just saying there is not a point at which they will collapse. We have a rule, you have to harvest some or they will go away. When the run was really huge, the perception was that not enough were harvested and it collapsed. We have been harvesting one-eighth or less of kings than we are accustomed to. Such a small number of fish.

33 34

The Commission, in strong support of all three special actions, requests and hopes that the Board will approve them and Federal managers will continue in consultation with the Commission.

38 39 40

41

42 43

Then last comments. Ms. Peltola says thank you. Indicators include size of snow pack, depressive snow on the river, water conditions. It looks like it will be a late breakup with cold temperatures and a lot of ice. Some are preparing for potential flooding.

44 45 46

47

48

Another sign is migratory birds and qulls were seen a couple days ago. Some geese are James' predictions have been uncanny. He passing. noticed abundance, whether birds arrive in big groups

Phone: 907-243-0668

or not or direction of wind, whether chinook arrive right after breakup. People are optimistic we will have the same number of chinook returning that were seen last year.

5 6

7 8

9

Long-term concern is we are thinking of decades, not just year. The Commission looked at the last 40 years of science rather than only recent years. The ADF&G forecast is give or take 100,000 fish. 2013, they were 100,000 fish off their forecast.

10 11 12

13

14 15

16 17

18

19

This is a major subsistence fishery. The way our river is managed in the same approach as ADF&G uses for a commercial fishery. We do not have a commercial fishery and haven't had for a number of years. The cost is too high to process harvest in Bethel. They are managing the subsistence fishery like it is a commercial fishery. If they are off for one or two years for subsistence economy, this is much more damaging.

20 21 22

23

24

25

What we are asking for is to look at the best practices in TEK and the most advanced, contemporary Western science that we can use as they just want the best practices used on your river.

26 27

That will conclude the quick summary of the tribal and ANCSA consultations.

28 29 30

Thank you, Mr. Chair.

31 32

33

34

35

36

MS. KENNER: Thank you, Orville. This is Pippa again. I do have some additional notes here. The Board has received the resolution from the Kuskokwim River Inter-Tribal Fisheries Commission signed by 26 of its 33 members fully supporting all three Special Action Requests.

37 38 39

40

41

42

The Board has also received a letter from the Yukon Delta National Wildlife Refuge Manager, who is the Federal in-season manager for this fishery, describing his in-season management strategy for this coming year.

43 44 45

I'd be happy to remind the Board of the contents of those letters if it wishes. Otherwise we'll move on to Frank continuing with our overview.

Phone: 907-243-0668

47 48

46

(No comments)

Page 22

MR. HARRIS: Thank you, Pippa. Good afternoon. This is Frank. Can everybody hear me?

CHAIRMAN CHRISTIANSON: Loud and clear, Frank. You have the floor.

MR. HARRIS: Excellent. We're going to start with an overview of the biological background. This is beginning on Page 32 of the analysis.

The sustainable escapement goal for Kuskokwim River chinook salmon was set in 2013 by the Alaska Board of Fisheries with a range of 65,000 to 120,000 chinook salmon. This goal has been met every year since 2014 through conservation efforts.

Total run sizes have slowly increased since an estimated low of approximately 79,000 in 2012. The estimated total run size is fairly consistent from 2015 to 2018, ranging from 125,000 to 136,000 chinook salmon. However, the estimated total run size jumped to a preliminary estimate of close to 227,000 chinook salmon in 2019.

The total escapement estimates follows the same general trend as total run estimates, the cyclical peaks and valleys. After the last peak in around 2004 the chinook salmon escapement dropped to a record low of around 41,000 in 2013 and increased to about 188,000 chinook salmon in 2019.

I'll discuss a little bit on the run timing. Chinook salmon enter the Kuskokwim River beginning in late May and continue to early August, with about 85 percent of the chinook salmon passing through the Bethel Test Fishery by July 1st on average. The Bethel test fishery operates annually from the end of May until late August and is used as an index of the number of fish passing that point in the river.

From 1984 to 2019, the median cumulative proportion of chinook salmon passing the Bethel Test Fishery by June 12 was approximately 13 percent, with the proportion of the run on that date in most years falling between 6 to 19 percent. There have been years when zero percent of the run has passed by that date, where other years there was nearly 40 percent that had passed. This is the date on which the State's season subsistence harvest restrictions end

annually.

I'll talk a little now on age composition of the run. Chinook salmon returning to the Kuskokwim River drainage usually complete their spawning migration between the ages of 4 and 7, with a majority returning at ages 5 and 6. Median brood year recruit age percentages are estimated at around 20 percent for age 4 fish, 38 percent for age 5, 39 percent for age 6, and 3 percent for age 7.

10 11 12

13

14

15

16

17

18

19

20

21 22

23

24

28

29

30

31

32

33 34

35

36

2 3

4

5

6

7

8

9

The 2019 chinook salmon return saw the arrival of the initial cohort from the 2015 return. These are 4-year-olds. Four-year-olds composed approximately 48 percent of that chinook salmon run, which is nearly a 30 percent increase from historical composition. Five-year-olds from the 2014 cohort composed approximately 32 percent of the 2019 run, which is a decrease of about 6 percent from historical composition. Six-year-olds from the 2013 cohort experienced a decrease in composition to approximately 15 percent or a 25 percent decrease from historical composition. Seven-year-olds from the 2012 cohort composed less than 1 percent of the 2019 run, which is a decrease from the historical composition.

25 26 27

Historically, Kuskokwim River chinook salmon show a strong sibling relationship at the younger age classes. With an estimated 48 percent of the 2019 chinook salmon return coming back as 4-year-olds, than the 2020 return to the Kuskokwim River will have a high number of 5-year-olds returning if the sibling relationship holds. In addition, the relationship of 3 to 4-year-old fish has been increasing in recent years indicating that there should be a strong return of 4-year-olds in 2020 because there was 4 percent 3-year-olds in 2019.

41

42 43

44

45

46

47

Okay. We'll move on to pre-season There are four separate models for pre-season forecast this year. We will only discuss three as one is based off another model and the one we will discuss is considered to be more precise. ADF&G pre-season forecast uses a method in which the range is equal to the prior year run size plus or minus the recent seven-year average percent deviation of subsequent year runs. The 2020 ADF&G pre-season forecast is 193,000 to 261,000 chinook salmon.

Phone: 907-243-0668

The second model is using the Bayestool, which was developed by Benjamin Stanton and Matt Catalano. The forecast methodology used in this tool is probabilistically based and is readily updatable during the course of the season. methodology considers deviations in run abundances from the entire time series, therefore it is able to consider all of the uncertainties in run abundances. This model predicts a 95 percent probability that the 2020 run returns between 125,000 and 380,000 chinook salmon.

11 12 13

14

15

16

17

18

19

20

21

10

1

2

4

5

6 7

8

9

The AR(1) empirical model designed by Curry Cunningham uses a lag 1 autoregressive model. This model scales the forecast uncertainty based on performance across the entire time series and is more likely to represent the true uncertainty of the 2020 run size. As such, the 95 percent AR(1) empirical High Density Intervals put the pre-season forecast at 100,000 to 328,000 chinook salmon. The BayesTool and the AR(1) empirical model output of these forecasts can be seen on Table 8 and 9 on Page 96 of the analysis.

22 23 24

25

26

27 28

29

30

31

Now we will specifically address some of the key points from Special Action Request FSA20-03, declines in age and body size. There are indications that age at spawning, average lengths and average weights of chinook salmon have decreased throughout their range. Researchers estimate that during the last 25 to 40 years the number of 6+ year old fish in the population has declined approximately 25 percent in the Kuskokwim River.

32 33 34

35

36

37

38 39

A recently released report by an AYK SSI independent expert review panel reports a 9 percent decrease in length of female chinook salmon spawning in the Kuskokwim River since the early 1970s. This is not associated with that report. In addition, the average weight of commercially-caught chinook salmon has decreased about four pounds from 1985 to 2010.

40 41 42

43

44

45

46

47

48

Theories as to why this is happening is warmer water temperatures in the Bering Sea, increasing growth rates that in turn causes fish to reach a spawning size threshold at a younger age as well as selective fisheries taking the biggest fish and removing those genetics from the population. However, neither of those theories explain all the uncertainty in the decrease. The trend towards smaller length at

Phone: 907-243-0668

age is also occurring in areas that have little exploitation.

2 3 4

There are negative implications of chinook salmon turning up younger and smaller sizes. Downward shifts in length at age and age at maturity can affect fitness of chinook salmon by reducing fecundity. In addition, larger females produce larger eggs, which typically have higher survival. Changes in size may also cause a change in spawning habitat use.

Recent simulation-based research has indicated that a decrease in an overall length of female chinook salmon in the Kuskokwim River may cause an estimated reduction of about 21 percent fewer eggs and 35 percent lower egg mass compared to the early 1970s.

The study also notes a 7.5 percent reduction in percent females in the Kuskokwim River population from four decades ago. Researchers also performed a spawner-recruit analysis for chinook salmon in the Kuskokwim River based on quality of escapement, with results suggesting that age and length of female chinook salmon has an effect on expected recruitment.

When simulating use of unrestricted gear, the authors state that more fish would be needed on the spawning grounds to meet SMSC, which is the total number of spawning salmon that would be expected to produce maximum sustainable harvest, than would be needed for the model used by ADF&G.

The effect of gear on SMSC when considering escapement quality does suggest a trade-off whereby lower escapement goals could perhaps be implemented if stakeholders were willing to accept consistently using smaller restricted-mesh gear.

A graph comparing escapement goals can be found on Page 85 -- I'm sorry, spawner recruit analysis can be found on Page 85 of the analysis.

There are limited options available to managers to slow, stop, or reverse the trends of declining fish body size. Management actions that may affect this decline on the population are limited to options such as restricting gillnet mesh sizes, extensive fishery closure windows to allow periodic

uninterrupted passage, or complete closure of the river.

2 3 4

Now we'll discuss risk to stock diversity. Over-fishing and high exploitation rates can threaten stocks with lower productivity, while stocks with higher productivity can sustain higher rates of exploitation. Recent research simulated the chances of Kuskokwim River chinook salmon populations being extirpated using differing exploitation rates and found that with an exploitation rate of 50 percent leads to about 20 percent of stocks at risk of extirpation. At 40 percent exploitation rates, leads to about 10 percent of the stocks at risk of extirpation and 30 percent exploitation rates leads to about 5 percent of stocks at risk of extirpation.

2.5

 This same study also suggested that a target harvest near historic maximum of around 150,000 chinook salmon, that included subsistence and commercial, would require managing for the upper end of the escapement goal to minimize extirpation risk.

Estimated exploitation rates of Kuskokwim River chinook salmon from the subsistence catch have varied tremendously between 1976 and 2013, with a low of around 15 percent in 1978 to a high of 59 percent in 2010. The average exploitation rate of chinook salmon specific to subsistence harvest on the Kuskokwim River during that timeframe is near 33 percent, occurring at a time before the front-end closure was enacted in 2017.

Historically, the subsistence harvest hasn't exceeded the 50 percent exploitation rate except during times of smaller run abundance, so usually less than 130,000 chinook salmon. This is shown in Figure 8 on Page 86 of the analysis.

I'll quickly discuss some impacts of climate-driven heat stress on migrating salmon. Extended exposure to temperatures above 20 degrees C can have negative physiological effects on chinook salmon. Lab studies have found that adult chinook salmon exposed to a water temperatures of 19 degrees C or more for more than a few hours can have a negative effect on egg viability and migration rates.

Monitored Kuskokwim River tributary

locations have recorded temperatures above 15 degrees Celsius each year. However, in 2019 water temperatures were above 20 degrees C in the Kwethluk River for six days, mostly during the afternoon. Typically during the morning temperatures were back down to 18 degrees C. Also in 2019 the Bethel Test Fishery recorded 12 days in a row of water temperatures greater than 20 degrees Celsius with a maximum of 22 degrees Celsius, which is 5 degrees above the latest five-year average.

Uncertainty in management of the fishery. Management of the Kuskokwim River chinook salmon stocks is challenging due to a lack of in-season survey and inventory monitoring data. Currently, the Bethel Test Fishery is the primary source for determining run strength and timing; however, the sonar in the Lower River is entering its fifth year and is becoming more useful.

In addition to the difficulties in using the Bethel Test Fishery for in-season management, there is an inability to separate out stock run timing. Too much pressure at the wrong location can jeopardize weak stocks.

In-season harvest estimates have been conducted by the Yukon Delta National Wildlife Refuge in cooperation with the Kuskokwim River Intertribal Fisheries Commission and the Orutsararmiut Native Council during recent years. The collection of this data had helped the in-season manager make informed decisions, particularly during years with lower returns.

For the 2020 season it is anticipated that the Yukon Delta National Wildlife Refuge will start the season with similar harvest monitoring efforts and will adjust after the first week if indicators of run strength match pre-season forecasts.

Pippa will take over now for the next section. Thank you, Pippa.

MS. KENNER: Thanks, Frank. Okay. We'll begin with number one. If this special action request is approved, then the Board will close Refuge waters to the harvest of chinook salmon from June 1 through June 30th, except by Federally qualified subsistence users identified in the Section 804

subsistence user prioritization approved by the Board in 2014 and fishing under the terms and authority of a community harvest permit, unless superseded by subsequent special actions.

This will mean chinook salmon fishing opportunities including schedules, openings, closures, and methods will be determined by the Federal in-season manager in consultation with the Kuskokwim River Inter-Tribal Fisheries Commission and other fishery managers including State and Tribal interests.

Decisions will be coordinated with the Office of Subsistence Management to ensure proposed actions align with Federal subsistence regulations and policy. Additionally, the Federal in-season manager will consult with 32 communities to establish an appropriate chinook salmon harvest allocation amongst these communities.

 We'll move on to Special Action Request 02. If this special action request is approved, then the Board will close Refuge waters to the harvest of chinook salmon from June 1 through June 30th except by Federally qualified subsistence users identified in a Section 804 subsistence user prioritization.

This will mean chinook salmon fishing opportunities including schedules, openings, closures, and methods will be determined by the Federal in-season manager in consultation with the Kuskokwim River Inter-Tribal Fisheries Commission and other fishery managers including State and Tribal interests.

Decisions will be coordinated with the Office of Subsistence Management to ensure proposed actions align with Federal subsistence regulations and policy.

Special Action Request 03. If this special action request is approved, then the Board will close Refuge waters to the harvest of chinook salmon throughout the run, except by Federally qualified subsistence users identified in a Section 804 subsistence user prioritization.

This will mean chinook salmon fishing opportunities including schedules, openings, closures, and methods will be determined by the Federal in-season manager in consultation with the Kuskokwim River Inter-Tribal Fisheries Commission and other fishery

managers including State and Tribal interests. Again, decisions will be coordinated with the Office of Subsistence Management to ensure proposed actions align with Federal subsistence regulations and policy.

4 5 6

7 8

9

10

11 12

13

Conversely, if these special action requests are not approved, then State subsistence and sport fisheries targeting chinook salmon will be closed prior to June 11th. State regulations now mandate that chinook salmon fisheries be closed through June 11th every year. The Kuskokwim Salmon Management Working Group, who for the past several years has recommended the start date of this front-end closure, will have its first meeting on May 5th to 6th.

14 15 16

17

18

19

20

21

Before June 12, ADF&G will issue an emergency order for at least one fishing period per week with 6-inch or less mesh-size set gillnets for the purpose of allowing harvest of non-salmon fish species during which chinook salmon can be retained. The exact fishing schedule that would occur after June 11 has not been finalized.

22 23 24

25

26

27

28

29

30

The ADF&G has announced that it will be discussing management options at the first Working Group meeting coming up on May 5th and 6th. However, they will present a plan to the Working Group that would allow an opening period for 20 hours a day every other day using drift gillnets with a maximum of 6-inch mesh and 25 fathoms in length, from the mouth of the river to the village of Tuluksak.

31 32 33

34

35

36

37

38

Fishing would be open upstream of the village of Tuluksak with 6-inch or less mesh gear size, with the exception of the Aniak box, where no retention of chinook salmon would be allowed until June 23rd. Retention of chinook salmon in the tributaries would be allowed with rod and reel in the subsistence fishery.

39 40 41

42 43

44

The State has issued an advisory announcement that the chinook salmon sport fishery in the Kuskokwim drainage will closed from May 1st through June 11th as mandated in State regulations, but might reopen after June 11th based on in-season indicators.

45 46 47

48

Now if these special actions are not approved, the Federal in-season manager in consultation with the Kuskokwim River Inter-Tribal Fisheries

Phone: 907-243-0668

Commission and other fishery managers could allow additional subsistence fishing opportunity over and above that allowed under State management.

Alternatively, the Federal in-season manager could close Refuge waters to the harvest of chinook salmon except by Federally qualified subsistence users until superseded by subsequent special actions. This would mean chinook salmon fishing opportunities, including schedules, openings, closures, and methods, would be determined by the Federal in-season manager in consultation with the Kuskokwim River Inter-Tribal Fisheries Commission and other fishery managers. Decisions would be coordinated with the Office of Subsistence Management to ensure proposed actions aligned with Federal subsistence regulations and policy.

Frank.

2.5

MR. HARRIS: Thank you, Pippa. The OSM conclusion is neutral on Federal Special Action 20-01, 20-02 and 20-03.

Proponents of these Special Action Requests have emphasized concerns regarding risks to Kuskokwim River chinook salmon stock diversity from high harvest rates, significant decline in body size, impacts of climate-driven heat stress on migrating salmon, and sources of uncertainty that increase risk. These risks are additive in nature and are cumulative.

Comments have focused on the danger of near extirpation of chinook salmon in some of the tributaries and the harm to run resiliency that follows, along with the danger to the continuation of subsistence uses if runs do not rebound to historical levels.

Comments have also focused on the effects of reduced body size and declining caloric value of chinook salmon harvests and the need to harvest higher numbers of chinook salmon to make up for these changes.

New research has confirmed that chinook salmon are coming back younger and smaller, have analyzed the risk to stock diversity and discussed the impacts of heat stress on chinook salmon. The research indicates a decrease in size and spawning potential

from 50 years ago while also defining risk to stock diversity as it applies to harvest rates. Additionally, the research has quantified a decrease in caloric value of chinook salmon in the Kuskokwim River Drainage.

5 6 7

8

9

10

11 12

13

14

15

16

4

Available forecasting methods and sibling relationships indicate that the 2020 return of chinook salmon to the Kuskokwim River may be strong enough to support both an escapement near the top end of the goal as well as a harvest within the historical range. Concerns have been expressed by the proponents over the uncertainty inherent in the methods used to model the pre-season forecast and poor returns in recent years. The quality of escapement in the Kuskokwim River Drainage chinook salmon stocks may be compromised.

17 18 19

20

21

Affected Regional Advisory Councils have provided support for these Special Action Requests. In light of all this, the OSM conclusion is neutral.

22 23 24

Thank you.

25 26

We will now try to answer any questions

27 28 29

30

31

CHAIRMAN CHRISTIANSON: Thank you for that thorough explanation of what we have before us today. I would open the floor now to any Board members who may have some questions.

32 33 34

MR. PELTOLA: Mr. Chair. BIA.

35 36 37

CHAIRMAN CHRISTIANSON: Gene, you have

38 39

40

41

42

MR. PELTOLA: Thank you, Mr. Chair. I have a series of questions in regard to the biological aspect of the proposal. Whoever may want to address them from OSM I'd be more than happy to hear their response.

43 44 45

46

47

48

The majority of the analysis is based on the forecast. I'd go to Page 42 of the analysis that stipulates that the current ADF&G pre-season forecast run size ranges for chinook salmon in the Kuskokwim River are produced by a method in which the

Phone: 907-243-0668

49 50

you may have.

the floor.

range is equal to the prior year run size plus or minus the recent seven-year average percent deviation of subsequent year runs.

So by reading that it more or less is being stated that if you're saying the forecast is based on one year of data, 2019, which happened to be about 100,000 fish off and we were fortunate that it was 100,000 high rather than low. So based on the previous eight or nine years which were all more or less declining, so we had an outlier.

Throughout the analysis there's mention about uncertainty in the Bethel Test Fishery, run timing and everything else, but I didn't see or read anything about the uncertainty in the forecast. Can you please address that. I have follow-up questions, Mr. Chair.

MR. HARRIS: Sir, are you speaking of uncertainty in the ADF&G forecast?

MR. PELTOLA: Affirmative.

MR. HARRIS: I'm sorry. I jumped in before I had the floor from the Chair. I'm sorry.

CHAIRMAN CHRISTIANSON: No, that's fine. I don't mind a free flow of information once we get to questions asked between Staff and Board. Expect that you have free exchange until the answers are satisfied.

Thank you.

 MR. HARRIS: So I believe that in terms of discussing the uncertainty in the ADF&G forecast, ADF&G might be more appropriate to discuss that. BayesTool and the AR(1) model forecast and how they're wider. The forecast run is wider. We covered on ADF&G on how their model is developed.

MR. PELTOLA: Mr. Chair, if I may. So the reason I ask that is, like I mentioned earlier with regard to the Bethel Test Fish run timing and everything else, it is mentioned there's uncertainty to be taken into consideration, but there was not any discussion of that within the analysis in regards to the forecast.

Like I mentioned, based on the discriptor of the forecast, we're basically relying on one data point from last year which establishes this year's forecast and then the variability about that point based on other historical factors, but there wasn't anything in the analysis to the tune of uncertainty with regard to discussion of the other aspects that utilized the in-season management in the analysis.

So basically the Federal Subsistence Board is asked to make a consideration -- a one year data point which does not constitute a trend, which the forecast itself was over 100,000 fish off, but like I said fortunately it was towards the higher end.

So, with that, it's hard to expect the Board to make a decision without a full engagement or discussion about the significant portion that's going to determine our Board whether to support or oppose these special action requests as presented to us today.

 $\,$ And if I may, Mr. Chair, I have a couple other questions with regard to the biological section.

 $\label{eq:CHAIRMAN CHRISTIANSON: You have the floor, Gene.}$

MR. PELTOLA: Thank you. Let me look through my notes. So when you talked about decrease in the -- a significant decline in salmon or proportion of females, it was a generic approach saying that it could have impact on fecundity.

But I found it a bit odd that there's a significant study which was reported on by Harper and Boersma, which was written up in 2019, that stipulated that one of the most productive drainages in the system, i.e. the Kwethluk, from 2015 to 2018, it showed a 50 percent reduction in freshwater productivity, and it was not even alluded to or mentioned within the analysis.

 That shows the documentation of a decline in freshwater production, like I said, from one of the most productive chinook tributaries in the watershed, that being the Kwethluk.

If that is the case, then those reductions in freshwater productivity, the outmigrations, will have compromised the base population for returns from now until 2023, which can allude to, if we have a reduction in outmigration, i.e. the indices of productivity in the freshwater, all other things being considered the same in the maritime or the nearshore environment for the first couple years in the deeper pelagic areas, then we could potentially have a reduced run expressed here in the next several years and it wasn't mentioned in the forecast at all.

Have you been exposed to that in the past, that particular report?

21 22

MR. HARRIS: Yes, I have seen that report. Unfortunately, it was not included. I was originally told that it was not finalized and so I didn't read that section -- well, actually, I never really included that section. Let me take that back. And then I was informed that it was finalized and it was getting late in the game, so I never went back to include any of that information.

It discusses how it has decreased. Lew actually was a co-author. I'm not sure if he's in on this call. But, yes, I've seen that report.

MR. PELTOLA: Okay. Thanks a bunch. Throughout the theme of the analysis it seems like there's emphasis put on the 2019 data point of having a higher than expected return, which everybody, don't get me wrong, appreciates and values. It seems to me the long-term average of the previous seven, eight years was not expressed as heavily. With reductions in those years we couldn't really support a full harvest level or exploitation rate as expressed by the long-term subsistence use, which is varied from I think 76 to -- in normal years, 76 up to 100-plus, but is around an 80-84,000 range. So that was a challenge for me to comprehend.

I think it's imperative as a Board when we deliberate these actions we take into consideration, one, that the forecast which should be utilized to project next year return is based on a single data point from last year, which was off by 100,000. If we carry that over to this year, then there's some inherent built-in variability that don't quite

understand how it transitions from last year to this year's, but also there's information that I think was pertinent to the Board to make an informed decision that has not been expressed.

 Like you touched upon the female -- not specifically you, but the analysis touches upon the fact that we have a decline in females in the Kuskokwim, we have a decrease in eggs over the last decades, we have a decrease in the length, which all potentially could lead to reduced fecundity. So that was a big challenge for me when I read through the analysis.

And the caloric requirements as attained by fish. There's a couple aspects which were touched upon, but I think could have been elaborated. If you look at the -- I don't recall what page, but the analysis stipulated that 100 fish caught in the '70s now equates to 125, 130 fish in current days. But also in the decrease of the utilization of chinook, which has been initiated on the Federal subsistence harvesters on the river, as done by two means. One, voluntary decrease in targeting chinook, and also by regulatory action, which has kind of forced a decrease in access to chinook. That's not totally addressed in the analysis.

 More importantly, I think that, you know, say we take a hypothetical family who used to take 200 kings. Now they're taking 50 kings because they want to conserve. But when you try to make up that difference between 50 and 200, it's not a one-to-one ratio in regards to the chums and the reds and chinook.

That I think could have been elaborated as well such that -- and I'm not saying it's an error on your part whatsoever or anybody that worked on the analysis, but to expose the Board with information to make a fully educated decision when considering whether to support or oppose the Special Action Requests.

Bear with me one sec. That's all I have for right now, Mr. Chair and I may come back at another time with additional questions as we proceed through the presentation.

CHAIRMAN CHRISTIANSON: Thank you,

```
Page 36
     Gene. The floor is still open for questions for Staff.
 2
 3
                     MR. SIEKANIEC: Mr. Chair. This is
4
     Greq.
5
 6
                     CHAIRMAN CHRISTIANSON: Greq, you have
 7
     the floor.
 8
9
                     MR. SIEKANIEC: Thank you, Mr. Chair.
10
    Gene, would you like me to see if Lew Coggins is online
11
     and could possibly address that freshwater productivity
12
     question you were asking?
13
14
                     MR. PELTOLA: I don't necessarily need
15
     it. I've seen the report, so I'm fine. I was just
16
     curious why it was not incorporated as part of the
17
     analysis.
18
19
                     MR. SIEKANIEC: Okay. All right.
20
     Thank you, Mr. Chair.
21
2.2
                     (Pause)
23
24
                     MR. SIEKANIEC: Mr. Chair. This is
25
     Greg.
26
27
                     CHAIRMAN CHRISTIANSON: Yeah, Greg, go
28
     ahead.
29
30
                     MR. SIEKANIEC: Maybe just one question
31
    for Frank. When I think about what I thought I was
32
     reading on all the different forecasts and the ones
33
     that were described and we just brought up the one that
34
     the Alaska Department of Fish and Game based on the
35
     2019 data point and a plus or minus 7 on how the
36
     previous years had influenced that.
37
38
                     Frank, didn't you describe that there
    were also other forecasts that actually display a
39
40
    larger range than the forecast provided by the Alaska
41
    Department of Fish and Game using an entire time
42
     series?
43
44
                     Thank you.
45
46
                     MR. HARRIS: Yes, there are two that
    use the entire time series and they're both fairly
47
48
    similar with their output.
49
50
```

```
Page 37
                     MR. SIEKANIEC: Mr. Chair. Frank,
     could you remind me what those were one more time.
 2
     know you said them when you were going through your
 4
     analysis.
 5
 6
                     MR. HARRIS: Okay. Give me one second
 7
     here to get back to that section.
8
9
                     MR. SIEKANIEC: Yeah.
                                            Thank you.
10
11
                     MR. HARRIS: Okay. The BayesTool,
     model prediction 95 percent probability that the 2020
12
13
     run will return between 125,000 and 380,000 chinook
14
     salmon. The AR(1) empirical model is a 95 percent
15
     high-density intervals of 110,000 to 328,000.
16
17
                     Thank you.
18
19
                     MR. SIEKANIEC: Frank, that time series
20
     was what?
21
22
                     MR. HARRIS: I don't know the exact
23
     start date, but it's I believe sometime in the '70s up
24
     till -- it incorporates pretty much all the data that
2.5
     they have.
26
27
                     MR. SIEKANIEC: All right. Thank you.
28
     Thank you, Mr. Chair.
29
30
                     MR. PELTOLA: Mr. Chair. BIA.
31
32
                     CHAIRMAN CHRISTIANSON: Gene, you have
33
     the floor.
34
35
                     MR. PELTOLA: So, Frank, on those two
     other models which you -- first off, could you refresh
36
37
     my memory on the bottom end of the State's model.
38
39
                     MR. HARRIS:
                                  The bottom end of the
40
     State's model is 193,000 chinook salmon.
41
42
                     MR. PELTOLA: So if you look at the
43
     other two and at the bottom end of the confidence
44
     interval we're talking 125,000 fish and 110,000 fish
45
     versus the higher bottom end from the one that's seen.
46
     I just wanted to point that out.
47
48
                     Thank you, Mr. Chair.
49
50
```

```
Page 38
                     CHAIRMAN CHRISTIANSON: Okay. The
    floor is still open for Board questions for Staff on
     this.
4
5
                     MR. REAM: Mr. Chair. National Park
 6
     Service.
8
                     CHAIRMAN CHRISTIANSON: National Park
9
     Service, you have the floor.
10
11
                               Thank you.
                                            I think this
                     MR. REAM:
12
     question would be for Pippa. I was wondering if you
13
     could please clarify which communities within the
     existing customary and traditional use determination
14
15
    have been excluded under the 804 subsistence user
16
    prioritization that starts on Page 52 of the analysis.
17
18
                     Thank you.
19
20
                     MS. KENNER: Thank you for the
21
    question, Dr. Ream. Through the Chair. There are
22
     eight. They are the communities on Nelson Island, on
23
     Nunivak Island, the southern Kuskokwim Bay they are
24
    Newtok, Tununak, Toksook Bay, Nightmute, Nelson Island,
25
     Mekoryuk, Platinum, Goodnews Bay and Quinhagak.
26
27
                     MR. REAM: Thank you, Pippa. This is
28
     Josh. Are those communities that primarily harvest
     their chinook salmon in marine waters?
29
30
31
                     MS. KENNER: No. Platinum, Goodnews
32
    Bay and Quinhagak they do rely on chinook salmon, but
     they're chinook salmon that are returning to the
33
    streams close to those communities and not within what
34
35
     we call the Kuskokwim River Drainage.
36
37
                     Newtok, Tununak, Toksook Bay, Nightmute
38
     and Mekoryuk actually rely more on sharing. Many of
     those communities do not have large runs of chinook
39
40
    salmon near their communities. Yes, if they are
41
    harvesting chinook salmon, it is in marine waters.
42
43
                     MR. REAM: Thank you, Pippa.
44
    all I have, Mr. Chair.
45
46
                     CHAIRMAN CHRISTIANSON: Any additional
47
    questions for Staff on the analysis.
48
49
                     (No comments)
50
```

CHAIRMAN CHRISTIANSON: All right. Hearing none. Do we move on next, I believe, to the Regional Advisory Council recommendations, Thomas?

6 Chair.

 $$\operatorname{MR}.$$ DOOLITTLE: That's correct, Mr. Chair. It would be Alissa Rogers or Eva Patton to start.

MS. ROGERS: Mr. Chair.

CHAIRMAN CHRISTIANSON: Yes, you have the floor, Alissa.

MS. ROGERS: Thank you, Mr. Chair. This is Alissa Rogers with the Yukon-Kuskokwim Delta Subsistence Regional Advisory Council. As for FSA20-01, 02, 03, the Regional Advisory Council recommendations, the Council voted in support of Special Action Request FSA20-01, 02, 03, citing concurrence with the majority of the public testimony they heard during the public hearing for the Special Action Request and also during the public and tribal comments during the Council's meeting.

 The Council expressed protecting a subsistence priority during these uncertain times is critical for communities situated along the Kuskokwim River. The Council stated that closing to all but Federally qualified subsistence users will help ensure these rural communities meet their subsistence needs. This is also a better tool for long-term conservation of chinook salmon.

The Council agrees that the justification presented in Special Action FSA20-03 the quality of escapement should be considered for the Kuskokwim River salmon management as the subsistence fishers are seeing smaller and smaller fish. They also concur that climate change impacts are creating more and more uncertainty for the health of the salmon and whether the successful return to spawn. The die-off of salmon observed in last year's extreme warm weather temperatures is of particular concern.

The Council feels it is imperative to manage the salmon fishery for conservation and subsistence priority in uncertain times to ensure the longevity, long-term viability of Kuskokwim chinook salmon to ensure that communities meet their

subsistence needs. The Council stressed that subsistence communities have been doing their part for conservation, restricting the harvest of chinook salmon in order to help the population rebound and that subsistence priority should be maintained at this time so the communities can benefit from those conservation efforts.

The Council further concurred with the justification provided in the Kuskokwim River Inter-Tribal Fish Commission's resolution in support of the Special Action Request FSA20-01, 02 and 03 presented during the meeting of March 16-17, 2020 meeting. The Council made a motion in support of this resolution as read into the record.

Thanks, Mr. Chair.

CHAIRMAN CHRISTIANSON: Thank you, Alissa. Any questions for the Chair from the Board.

(No comments)

CHAIRMAN CHRISTIANSON: Hearing none. Thank you, Alissa. Was there additional Regional Advisory Council recommendations.

MR. REAKOFF: This is Jack Reakoff,

29 WIRAC.

CHAIRMAN CHRISTIANSON: You have the floor, Jack. Thank you.

 MR. REAKOFF: The Western Interior Regional Council met in Fairbanks on March 2 and 3. On the 3rd we took up the Special Action Request 20-01, 02 and 03. The Council supports the Special Action Request. Justification. Western Interior Council supports the premise of these requests.

The Council stressed that Special Action Request 20-03 looks at the issue in more detail and brings up several good points that were observed in last year's fishery such as risk to stock, diversity, high harvest rates, significant decline in body size, impacts of climate-driven heat stresses on migrating salmon and sources of uncertainty that increase risk. These details were not considered in previous Special Action Request analysis.

```
Page 41
                     The Council said management actions in
   these requests are a high priority for residents of the
     Western Interior Region and the Federal Subsistence
 4
     Board.
 5
 6
                     Thank you, Mr. Chair.
 7
8
                     CHAIRMAN CHRISTIANSON: Thank you,
9
     Jack. Any questions for the Chair.
10
11
                     (No comments)
12
13
                     CHAIRMAN CHRISTIANSON: All right.
14
     Hearing none. Are there any additional Regional
15
     Advisory Council Chairs to speak to this action.
16
17
                     (No comments)
18
19
                     MR. DOOLITTLE: There isn't, Mr. Chair.
20
     This is Tom Doolittle.
21
2.2
                     CHAIRMAN CHRISTIANSON: Okay. Thank
23
     you, Tom, for that. I believe next we call on the
24
     State.
25
26
                     MR. DOOLITTLE: This would be the
27
     public comment period, Mr. Chair. That would be open
    at your discretion. That would again have State
28
29
     partners and tribal partners and others that could
30
    speak, but the public comment aspect in a temporary
     action is at your discretion, Mr. Chair.
31
32
33
                     CHAIRMAN CHRISTIANSON: I think we'll
34
    take some public comment. I would just ask if there
     are on this line, Operator, anyone on the line for
35
     public comment, that they please try to stick to the
36
     10-minute guideline that we've established just in
37
38
     order if there is an overwhelming turnout.
39
40
                     So at this time I would entertain some
41
    public comment as it pertains specifically to this
42
     Special Action Request on the Kuskokwim. Operator,
43
     thank you.
44
45
                     OPERATOR: Thank you, sir. If at this
46
    time you would like to queue up for public comment, you
47
     may do so by pressing *1 and recording your first and
48
     last name. One moment, sir.
49
50
```

```
Page 42
                     (Pause)
2
3
                     MR. DOOLITTLE: Mr. Chair.
5
                     CHAIRMAN CHRISTIANSON: Go ahead, Tom.
 6
7
                     MR. DOOLITTLE: I would recommend,
8
     since the State of Alaska is online and they are on a
     mute button, that they do present their comments. I
10
     know that Mr. Kevin Whitworth, Operator, wanted to be
11
     in the queue as well.
12
13
                     OPERATOR: Yes, sir, and he has queued
14
     up. Would you like me to open his line at this time?
15
16
                     MR. DOOLITTLE: It's at the discretion
17
     of the Chair where he would like the comment to start.
18
19
                     Thank you, Operator, and Mr. Chair.
20
21
                     MS. ROGERS: Mr. Chair.
22
23
                     CHAIRMAN CHRISTIANSON: Alissa.
24
25
                     MS. ROGERS: Thank you, Mr. Chair.
26
     Would it be appropriate if you are going to take up
27
     public comment that I exchange my hat for a minute and
28
    put my RAC Chair hat down and make a personal comment
29
     if that's okay with you, Mr. Chair.
30
31
                     CHAIRMAN CHRISTIANSON: Yes, you can,
32
     but since I've already called on the State I think I'll
33
     let the State go, Alissa, and then I will entertain you
34
     as a public commenter.
35
36
                     MS. ROGERS: Thank you.
37
38
                     CHAIRMAN CHRISTIANSON: Operator, could
39
     you make the State's line available, please, and we
40
     will listen to our State counterparts' recommendation
41
     on this Special Action Request. Then we will open up
42
     the floor to public comment.
43
44
                     Thank you.
45
46
                                Thank you, sir. Whose name
                     OPERATOR:
47
     am I looking for to open for the State?
48
49
                     MR. MULLIGAN: Can you guys hear me?
50
```

```
Page 43
                     CHAIRMAN CHRISTIANSON: You have the
 2
    floor, Ben.
 3
 4
                     MR. MULLIGAN:
                                   Thank you, Mr. Chair.
     For the record, my name is Ben Mulligan representing
 5
     the Alaska Department of Fish and Game. I will keep my
 7
     comments short. You all have our written comment, so
     you know -- and you've discussed actually most points
 8
 9
     that I would be making anyway as far as what we're
     looking at as the 2020 pre-season outlook and what that
10
     means for management.
11
12
13
                     We've described what we've done since
14
     2013 to improve our management capabilities on the
15
     Kuskokwim. We've laid out how we would manage the
     Kuskokwim based off of that information and how we
16
17
     would progress as we looked at in-season information.
18
     Even mentioned the Kuskokwim River Working Group
19
     meeting that's next week that helps guide us in our
20
     management.
21
2.2
                     The Department is fully capable of
23
     managing and conserving king salmon on the Kuskokwim
24
     River and we're prepared to do so.
25
26
                     Thank you for listening.
27
28
                     CHAIRMAN CHRISTIANSON: Thank you for
29
     the State. Any questions for the State from the Board.
30
31
                     MR. SIEKANIEC: Mr. Chair. This is
32
     Greg.
33
34
                     CHAIRMAN CHRISTIANSON: Greq, you have
35
    the floor.
36
37
                     MR. SIEKANIEC:
                                     Thank you.
                                                 Thank you,
38
     Dan. Refresh my memory. Is there any commercial
     fishery associated with the Kuskokwim right now for the
39
40
     chinook?
41
42
                     MR. MULLIGAN: No, sir.
43
44
                     MR. SIEKANIEC: And with a run such as
45
     this size there would be no intention to have a
46
     commercial fishery?
47
48
                     MR. MULLIGAN: No, sir.
49
50
```

```
Page 44
 1
                     MR. SIEKANIEC: Thank you, Ben.
 2
 3
                     CHAIRMAN CHRISTIANSON: Any other
4
     questions from the Board for the State.
 5
 6
                     (No comments)
 7
8
                     CHAIRMAN CHRISTIANSON: Hearing none.
9
     Next, Operator, I'd call on Kevin Whitworth. He was
     going to be recognized as the next public commenter.
10
11
12
                     OPERATOR: His line is open.
13
14
                     MR. WHITWORTH: Can you hear me?
15
16
                     CHAIRMAN CHRISTIANSON: Yes, I hear you
17
     good. You have the floor, Kevin.
18
19
                     MR. WHITWORTH: Thank you, Mr. Chair.
     Board members. First of all I just really appreciate
20
21
     the moment of silence for Ray Collins. I just had
22
     somebody in the community in McGrath that asked if I
23
     could do that, but you guys already did it, so I really
24
     appreciate that.
25
26
                     Anyhow, I'm Kevin Whitworth, biologist
27
     for the Kuskokwim River Inter-Tribal Fish Commission.
28
     I previously worked for the State of Alaska, Department
29
     of Natural Resources and the U.S. Fish and Wildlife
30
     Service. While at the Service I worked at various
31
     Refuges throughout the state including Selawik, Tetlin,
32
     Innoko, Koyukuk, Nowitna, Alaska Maritime, Yukon Delta.
33
34
                     My last position was the Deputy Refuge
35
     Manager at Innoko National Wildlife Refuge in McGrath.
     I currently live and raised my family here in McGrath.
36
37
     The headwater community is the Kuskokwim River. I'm a
38
     member of the McGrath Native Village.
39
40
                     The Kuskokwim River Inter-Tribal Fish
41
     Commission, the Commission, hereby supports the
     Temporary Special Action Request FSA20-01, 02, 03,
42
43
     requesting the Federal Subsistence Board to provide for
44
     priority consumptive uses under the provisions of
45
     Section 804 of ANILCA by closing Federal public waters
     of the Kuskokwim River Drainage to the harvest of
46
47
     chinook salmon except by Federally qualified
     subsistence users at the beginning of the 2020 chinook
48
49
     salmon run.
50
```

Justification for the Commission's position is based on several factors, but due to a limited time here I will only concentrate on a few. Simply put, number one, the Kuskokwim River chinook salmon population has not yet recovered. The past 10 vears chinook salmon runs have been the lowest on record going back to the 1970s. This has resulted in the past nine years of subsistence harvest needs not being met. Last year 2019 was the first significant increase in run size in a decade and has yet remained the single year outlier, not a trend.

11 12 13

14

15

16

10

1

5

7

8

9

We can fairly ask the question what other important declined populations critical to subsistence would be declared recovered and subjected to a full harvest rate after only one year of improvement?

17 18 19

20

21 22

23

24

25

26

Number two. The Commission has concerns regarding the 2020 preseason forecast. mid point of the ADF&G forecast is simply based on a single year equal to the prior year's run estimate. Basically ADF&G uses the 2019 run size as a 2020 forecast. This means this year's forecast is dominated by prior years run size regardless of how good or bad it was. This approach creates uncertainty, unnecessary risk for the Federal Subsistence Management Program.

27 28 29

30

31 32

Let me give you a couple examples. Last year the forecast was off by 100,000 chinook salmon. Thank goodness it was off in the right direction. It could have easily been off in the other direction.

33 34 35

36

37

38

39 40

41

42

In 2013 a very optimistic forecast was used between 160,000 to 240,000 chinook salmon were projected to return. Yet this time the error was in the other direction. Only 84,000 chinooks returned. At least 100,000 off from the forecast. That year the riverwide escapement goal was not met. All tributary escapement goals were not met. The run was overharvested and still harvest needs were not met. A disaster by anyone's estimation.

43 44 45

46

47

48

49

50

The actual level of uncertainty estimated using all years from 1976 to 2019 in the available datasets is 110,000 to 328,000 chinook salmon. Because forecasting is highly uncertain there is a reasonable possibility the run will not return as

Phone: 907-243-0668

forecasted. This creates management uncertainty about whether the Federal Subsistence Management Program can uphold ANILCA conservation and priority use mandates.

4 5

6

7

8

9

10

Number three. Not only do we have forecast uncertainties, we have a population showing signs of long-term population decline. Studies on the Kuskokwim have suggested widespread declines of the proportion of females and reproductive potential as well as a significant decline in overall chinook salmon body size.

11 12 13

14

15

16

17 18

19

20

21 22

Another study documented significant decreases in the juvenile productivity on what has traditionally been one of the most productive tributaries on the entire river, the Kwethluk. Add to this the risks associated with high harvest rates, such as overharvest of salmon from tributaries that are less productive. The management uncertainties can quickly become insurmountable.

There are examples all over the world of populations managed and harvested to the point of collapse.

23 24

25

26

27

28

Number four. We have not addressed environmental uncertainties, but have only touched on a few of the management and population risks. I'm not going to get into environmental uncertainties, but there are some that some people have already mentioned, like heat stress.

29 30 31

32 33

34

35 36

37

38

40

39

41

Number five. We are faced with a number of uncertainties. Another concern we have here is -- I'm going to quote from the In-season Manager Ray Born's paper here. The Federal In-season Manager believes restrictions to the fishery after June 11 would only be necessary if the cumulative passage of chinook salmon before June 11 were little to none at the Bethel Test Fishery, Bethel area sonar operations and the subsistence fishermen were not catching any chinook on the first driftnet opener. This is page 4 of his in-season strategy just released yesterday afternoon.

42 43 44

45

46

47

Basically this trigger is too low. means that we will not be providing any meaningful protection under ANILCA. If this trigger was used in 2013, there would have been no Federal action and we know the disaster that happened then.

Phone: 907-243-0668

2

4

5

6 7

8

9

10

11

14

15

16

17 18

19 20

21

22 23

24 2.5

26

27

28

29 30

31

32

33

34 35

36

37

38 39

40

41

42

43 44

45

46 47

48 49

50

Page 47

In conclusion, rarely do managers encounter such widespread support of a more conservative management strategy in what we have seen shown by communities on the Kuskokwim River. Science supports the need for a more conservative approach.

Managing a declined stock of such critical importance should be inherently risk averse. Given forecast uncertainty and signs of long-term population decline, it would be reckless to assume that a single year increase in the chinook run constitutes a

12 complete recovery. 13

Therefore, the Kuskokwim River Inter-Tribal Fish Commission recommends adopting Temporary Special Action Requests FSA20-01, 02, 03.

Thank you, Mr. Chairman.

CHAIRMAN CHRISTIANSON: Thank you. Any questions from the Board.

(No comments)

CHAIRMAN CHRISTIANSON: I'd like to thank you, Kevin, for calling in. Hearing no questions from the Board. We'll move on to Alissa. You have the floor.

MS. ROGERS: Thank you, Mr. Chair. I'll go ahead and make mine very quick. My name is Alissa Nadine Rogers. I'm a subsistence user out of the community of Bethel. I've been a fisherman and subsistence harvester since I was like two weeks old, I believe was my first time when I went out because I was born in the springtime. My life has been out there this whole time. The only time I left was for school.

I'm taking off my RAC Chair hat and I'm going to be presenting my personal opinions. I am not in any legal way presenting anything from the Y-K Delta RAC or any of its Council members.

As a subsistence user on the Kuskokwim River over these past years and being very heavily involved in the fishery since 2006, 2007 when I first started really diving into these issues and going -being taken under one of the greatest people who ever fought for the fisheries in this region from the time

Phone: 907-243-0668

Computer Matrix, LLC 135 Christensen Dr., Ste. 2., Anch. AK 99501 Fax: 907-243-1473 2 3

4

5

6

7 8

9 10

11

12 13

14

15 16

17

18

19

20

21

22 23

24

25

26

27

28

29

30 31

32

33

35

36

37

38

39

40 41

42

43

44 45

46

47

48 49

50

34

Page 48

that I first met them.

Being kind of like mentored, I guess you would say, on how to deal with the different types of management styles and different types of things and learning O&As and politeness of the regulatory life and regulatory year which I was training to overtake one of these days.

There was really no one my age or within my age group that really had a huge interest in it, so it kind of breaks my heart that we don't have enough younger people out there who really want to dive into this kind of stuff.

A lot of people I talk to that are my age they're a little frustrated because they just don't want to hear the bureaucratic B.S. of all this back and forth, back and forth and then saying one thing and then turning around and doing another thing. It's just not their cup of tea, I guess.

With that being said, I understand what we're looking up against this year. I understand what we're looking at. Regardless of what year it is or whatever management year you talk about you've got to think about all these other type of things. You've got to think about people who really have an interest in these things and then also the bear roots of it.

A lot of the things that we talk about in these meetings kind of turns people off and it's really hard to follow exactly what we're talking about. One of the things, I was working as a laws and regulatory specialist out here for this region, was that we had to take a lot of the emotional jargon out to find out what the root meaning was behind any management decisions or any management proposals that we're being asked for.

So in regards to chinook salmon this year and these things that you guys are going to be talking about and discussing what your personal options are going to be taken up, honestly, the chinook salmon is still in conservation mode and it won't ever get back to its glory days like everyone has been talking about.

Phone: 907-243-0668

Our past glory days when chinook salmon

Computer Matrix, LLC 135 Christensen Dr., Ste. 2., Anch. AK 99501 Fax: 907-243-1473

were amazingly huge and huge numbers, et cetera, et cetera. Yeah, they were then, but they're not now. The only way to repopulate or bring up these big genetic stocks is by working backwards from the way we went forward and figuring out where we messed up and how we can fix it and fixing patches exactly the way we have been doing.

7 8 9

10

11

12 13

14

15

16

17

18

19

20

4

5 6

> Pointing fingers at each other and trying to put blame on each other without actually thinking about the longevity of it and the optics of it, it's really pissing people off. We already know that we're not ready to go into a complete unrestricted fishery. We have laws and regulations that we have to follow and abide by and agreements that we have to abide by in regards to this fishery. People acknowledge that out here and they understand that. They just want some simple direction on what to do. Not being told a million different things by so many different types of management. They want one simple let's follow this.

21 22 23

24

25

26

27

28

29

30

31

As for finding the right balance to protect the subsistence harvest, we have to look at different types of management that are productively working, but then you also have to look at what were they using in order to have those management decisions. What data were they using, who were they using these from, because if those people are the ones that are giving data to the people who are actually managing these fisheries, then maybe we should ask them for their decisions and what they want to do as well.

32 33 34

35

36

37

38

39

40

41

42

My vote is that we follow through and let ADF&G do their job. That's what their job is to do. Now if they don't follow through in regards into the fisheries because the fishery is coming in low or there's something that happened and the Federal management has to take over, then, yeah, we can step back in and help manage the fishery this year. But is this really a power management or is this just let's take care of what's best and what's best for the resources in regards to our situation.

43 44 45

46

47

48

ADF&G has managed strategies currently in place and by regulation and with the management tools to adequately prepare for the range of uncertainty that they already have. They learn from their mistakes. They fix their things. But they also

Phone: 907-243-0668

have the important data information to manage the fishery. Regardless of the type of fishery management we're all going to be talking at the same table. It doesn't matter whose house we're in. We're all going to be talking about the same thing.

I sit on the Kuskokwim Salmon
Management Working Group. I sit on the village
council. I sit on all these different types of things
and we all talk about the same thing regardless of who
is in charge or who is calling the shots at this point.
I honestly believe that let's let the people who have
been doing this job for a long time let them do their
job. If we have to take over because of some
scientific, some biological thing, then we can do that
and a lot of people on this river believe the same
thing.

Thank you, Mr. Chair.

CHAIRMAN CHRISTIANSON: Thank you, Alissa. Any questions for Alissa from the Board.

(No comments)

CHAIRMAN CHRISTIANSON: Hearing none. Operator, is there anybody else online that would like to give public testimony on this proposal.

OPERATOR: Yes, sir. Thank you. Next is Mike Williams, Sr. Your line is open.

MR. WILLIAMS, SR.: Thank you, Honorable Chairman Tony Christianson and the rest of the Board. My name is Mike Williams. I'm currently the Chief of the Akiak Native Community who submitted and signed the Special Action 20-01. We have been submitted Special Action Requests for the last five years and I really appreciate and honor the acceptance of our request to help conserve our chinook in question over the years since 2013, 2012.

We've been working hard and sacrificing a lot during these tough times and we feel that the Kuskokwim king salmon run is not yet completely recovered. So in order to support conservation and rebuilding we have been, like I said, sacrificing by not being able to harvest as many kings as we need for subsistence since 2009.

I ask the Federal Subsistence Board to support these Special Action Requests. Not adopting these Special Action Requests and turning management over to the State would be detrimental to the conservation provisions and subsistence priority uses required by ANILCA because the forecast is highly uncertain.

7 8 9

10

11 12

13

4

5

6

Just like we have now on the Kuskokwim River with the ice. It's uncertain how we're going to be affected, but we have seen what the flood has done up in Napaimute currently and that's what we found out from looking at the uncertain results of the river's actions.

14 15 16

17

18

19

20

21 22

If it becomes necessary to restrict harvest, the State will not provide for rural priority and we know that. We've been working with this. The main reason why we have asked for Federal management all these years. It may be necessary to restrict harvest and the State has shown that they last managed in 2013 that they are not committed to the conservation priorities of ANILCA.

23 24 2.5

26

27

28

29

I think it was mentioned the Federal managers have that obligation to take action if there's a conservation concern. I have not read that plan made by the Federal Manager here, but I heard by our fisheries biologist Kevin that threshold is too low and too risky and I agree with him.

30 31 32

33

34

35

36

Given the uncertainty and risk factors, it is the job of the Federal Subsistence Program to first verify that there is sufficient abundance before allowing ADF&G to manage because the State of Alaska cannot provide a rural preference or subsistence priority.

37 38 39

40

41

42 43

44

45

I ask the Federal Subsistence Board to support these Special Action Requests because we want you to uphold ANILCA and we don't want to see the gains that we have made over the years lost into dust. People on the Kuskokwim River are thankful for the Federal government has for the past six years helped us conserve our subsistence salmon while we are using to feed ourselves with the Federally qualified users.

46 47 48

Lastly, I want to thank the Yukon-Kuskokwim Delta RAC for unanimously supporting

Phone: 907-243-0668

all three SARs. From the full RAC meeting I applaud even the Yukon RAC members fully supporting our Special Action Request. Again, in these times of uncertain times I think we need to have a better record instead of going with last year. I think our goal was to go on that trend.

Right now is not the time to put our chinook at risk for abruptly changing the management. So I urge you and implore you to continue this effort and maybe in time if we have that good track record then we will do it.

Thank you for your time, Mr. Chairman.

 CHAIRMAN CHRISTIANSON: Thank you, Mike. Good to hear you. I'm glad you took the time to call in today and speak on behalf of the Kuskokwim River people. Any questions for Mike.

(No comments)

CHAIRMAN CHRISTIANSON: Hearing no questions for Mike. We'll ask if there's any other public online.

OPERATOR: Thank you, sir. The next comes from Lee Wallace. Your line is open.

MR. WALLACE: Thank you, Mr. Chair. Thank you FSB Board. I'll make it real brief. I'm just in support of all the Special Action Requests at this time. Stating the reasons from all that was presented from all the individuals supporting this action. I'll just thank you for that.

That's all I have.

CHAIRMAN CHRISTIANSON: Thank you, Mr. Wallace. Thank you for calling in and supporting the Special Actions.

Any other public testimony online.

OPERATOR: The next comes from Curry Cunningham. Your line is open.

MR. CUNNINGHAM: Hello. Thank you for the opportunity to speak today. My name is Curry

Cunningham. I'm a professor of quantitative fisheries with the University of Alaska Fairbanks. However, today, I'm representing the Kuskokwim River Inter-Tribal Fisheries Commission and providing public comment because a portion of my work related to preseason forecasting methods was referenced in the FSA20 staff analysis.

7 8 9

10

11

12 13

5

6

The central message of my comment relates to how uncertain generally preseason forecast for chinook salmon in the system actually are and potentially how that should influence our level of precaution when developing and implementing our harvest strategies.

14 15 16

17

18

19

20

21

Predicting the number of salmon that will return prior to the season is challenging, particularly for chinook salmon in the Kuskokwim River. These predictions haven't proven to be extremely accurate historically, resulting in large sort of quote/unquote forecast ranges as we talked about earlier.

22 23 24

25

26

27

28 29

30

I want to be clear that these broad forecast ranges are not a reflection of the quality of the work or abilities of fisheries managers or scientists, but actually a reflection of the quality of the data we have available on which to base these preseason forecasts and how inherently predictable or unpredictable salmon returns are across time for the system.

31 32 33

34 35

36 37

38

Nonetheless it's pretty important that we fully account for the uncertainty in our salmon forecasts because a forecast is really more than just a point estimate. It requires us to think about how likely we are to be wrong and to really identify how much risk we incur if we are wrong in our preseason forecast.

39 40 41

42 43

44

45

46

47

48

49

50

To that end I was asked to explore uncertainty in alternative forecast methods for the system. My conclusion was generally, among others, that the method used by the Alaska Department of Fish and Game for quantifying forecast uncertainty, that kind of seven-year error rate, really does not adequately capture the full range of uncertainty for the 2020 Kuskokwim chinook forecast for run size of 2020 season. It's more appropriate I think to use the

Phone: 907-243-0668

4

5

6

7

8

9

10

11 12

13

14

15 16

17

18

19

20

21 22

23

24

25

26 27

28

29

30 31

32 33

34

35

36 37

38

39

40

41

42 43 Page 54

entire time periods of observations to quantify the true level of uncertainty in our preseason forecast.

You know, as we talked about before, the current preseason forecast methods for the system predict the number of king salmon of the current year as being equal to the number that returned or were reconstructed in the previous year. That is to say that the 2019 run size prediction was based on the 2018 reconstructed run size and the 2020 run size prediction is based on what we observed in 2019. While there's a valid justification for this method based on the data, we should be clear that these predictions are not perfect and there's a fairly high level of uncertainty.

My other comment relates to what happens when our forecasts are wrong. We should be clear that the risk associated with an overly optimistic forecast is higher than that of a forecast that turns out to be lower than the true run size. If the 2020 salmon return turns out to be higher than the forecast, there's a risk in the near term that we harvest too little in 2020. That is to say we forego potential yield this coming summer for the current year.

However, if the run size turns out to be lower than the forecast and misleads us to harvest too many salmon, the impacts are felt across several future years as a result of lower than potential production from this 2020 brood year. In this way the risk associated with an over-forecast or an under-forecast event is not equal and there's greater risk associated with an overly-optimistic forecast in my opinion.

In summary, I guess given the limited information available within the season to inform management, harvest strategies for Kuskokwim River chinook salmon are pretty heavily reliant on preseason forecasts. It's pretty critical that we ensure that we're fully aware of just how uncertain these preseason forecasts are and consider how this impacts our willingness to propose potentially more risk prone harvest strategies early in the season.

Phone: 907-243-0668

Thank you.

CHAIRMAN CHRISTIANSON: Thank you. Any

47

45 46

44

```
Page 55
     questions from the Board.
 2
 3
                     MR. SIEKANIEC: Mr. Chair. This is
4
5
     Greg.
 6
                     CHAIRMAN CHRISTIANSON: Go ahead, Greq.
 7
8
                     MR. SIEKANIEC: Yeah, I think you just
9
     referenced the thinking or the adoption of perhaps more
10
     risk prone strategies early in the season. Can you
11
     give me an idea of what you were referencing there.
12
13
                     MR. CUNNINGHAM: Well, you know, we go
     into the season with a certain idea of how we're likely
14
15
    to manage and how much fishing opportunity is going to
     be provided. To some extent in this fishery versus
16
17
     other salmon fisheries throughout the state that's
18
     based more on the preseason forecast just because of
19
     the limited utility of in-season information early on.
20
     So directly related to harvest opportunity I would say.
21
22
                     MR. SIEKANIEC: Thank you, Mr. Chair.
23
24
                     CHAIRMAN CHRISTIANSON: Any other
25
     questions from the Board.
26
27
                     (No comments)
28
29
                     CHAIRMAN CHRISTIANSON: Thank you for
30
     taking the time to call in today and share that.
31
32
                     MR. CUNNINGHAM: Thank you very much.
33
34
                     CHAIRMAN CHRISTIANSON:
                                            Operator, is
35
     there anybody else online who would like to give
36
     testimony.
37
38
                     OPERATOR: Yes, sir.
                                           The next comes
39
     from Bob Sattler. Your line is open.
40
41
                     MR. SATTLER: This is Bob Sattler. I
42
     just want to confirm you can hear me.
43
44
                     CHAIRMAN CHRISTIANSON: You've got the
45
     floor, Bob. Hear you loud and clear.
46
47
                     MR. SATTLER: Okay. Thank you.
     appreciate the opportunity to make a few comments.
48
49
     Sattler with Tanana Chiefs Conference. I work with
50
```

Kevin Whitworth fairly closely. I'd like to just make a few comments on another kind of science.

 With Tanana Chiefs I've worked as the cultural resources manager and an archaeologist for several years and I've had the great privilege in the last few to be working there in McGrath on an ancient habitation site, the Tochak-McGrath discovery. Pre-contact archaeological site where there is a disproportionate amount of fish. As part of that research it got me familiar with some of the ancient DNA studies being done with salmon and particularly chinook salmon.

There's sort of a long story there, but in my review of some of that literature, particularly in the Columbia and the Klammath River, there have been ancient DNA studies from ancient subsistence camps that have demonstrated a great loss of diversity in those fisheries. Largely it's due to the modern fishing practices, commercial fishing, overharvesting and particularly the canneries, hatcheries.

We don't have that data for the Kuskokwim, but what the studies have shown is the loss of diversity and the loss of diversity is translated to the loss of adaptability with future climate challenges.

So I say that in support of these Special Action Requests and to emphasize the conservation side of the fisheries and then this request limiting the fisheries to the qualified Federal subsistence users.

There may be others to testify here, so I'm going to leave it at that. I appreciate the opportunity of sharing my comments with you.

Thank you much, Mr. Chairman and the

 Board.

CHAIRMAN CHRISTIANSON: Thank you for taking the time to call in. Any questions from the Board.

(No comments)

CHAIRMAN CHRISTIANSON: All right.

Hearing no questions from the Board, we'll ask if there's any additional public testimony.

3 4

OPERATOR: Thank you, sir. The next comes from Daniel Schindler. Your line is open.

5 6 7

8

9

10

11

12

MR. SCHINDLER: Good afternoon. I'm Daniel Schindler. I'm a professor of fisheries at the University of Washington. Thank you, Mr. Chairman for this opportunity. I have been asked by stakeholders to call in and comment on the Special Action Requests being considered today and provide a scientific summary of panels.

13 14 15

16

17

18

19

20

This is a chair that was commissioned by the Arctic Yukon Kuskokwim Sustainable Salmon Initiative. The expert panel was represented by scientists from U.S. Fish and Wildlife Service, Alaska Department of Fish and Game, Canada Department of Fisheries and Oceans, University of Alaska Fairbanks and University of Washington.

21 22 23

24

25

26

27 28

29

What we were asked to do is quantify the trends and the quality of the fish returning to spawn in the Kuskokwim River. Obviously there's a lot of anecdotal traditional knowledge and traditional observations about changes in the sizes and the sex ratios of fish in the Kuskokwim over the last few decades. So our goal was really to quantify these trends in scientific terms.

30 31 32

33

34

35

36

37

38

39

40

41

Earlier, maybe an hour ago, someone summarized some of our findings, so some of this will be a bit repetitive, but I'll say it again. We considered data that were available between 1972 and We asked how changes in the sex ratio of fish -how big those sex ratio changes have been, how big the changes in age composition have been and how big the changes in the size at age of fish have been and then basically add up all those changes and ask how much has reproductive potential declined in the Kuskokwim between 1972 and 2017.

42 43 44

45

46

47

48

49

50

As we heard earlier, what we see is an overall nine percent decline in average length of Kuskokwim chinook. Which may not sound like much except when you re-express that in terms of how many eggs those fish are carrying. So a nine percent decline in mean length of fish returning to the

Phone: 907-243-0668

Kuskokwim translates into 21 percent fewer eggs.

It turns out that bigger females carry bigger eggs as well as more eggs. The reason that's important is it's thought that the larger the egg the higher survival or the higher the probability of survival of those juvenile fish. So if we then translate these changes in size into changes in the total egg mass brought back to the river by migrating fish, we see a decline of 35 percent.

10 11 12

13

14

15

3

4

5

7

8

9

On top of that we see a shift towards more males and fewer females returning to the river and when we account for that we see a 40 percent decline in the reproductive potential of your average fish returning to the Kuskokwim River between 1972 and 2017.

16 17 18

19

20

21 22

23

It's noteworthy that the last two observations we looked at were for 2016 and 2017 and those two years were actually substantially below the smooth trend that we fit to the long-term data. So what this is saying is that sizes and ages of fish has been declining for 40 years and it's showing signs that it may actually be accelerating.

24 25 26

27

28

29

30 31

32 33

This is what I heard earlier on the call today is that even though the return in 2019 was a relatively strong return compared to what's been seen in the last few years, almost half those fish were age 4 fish, which you can interpret in two ways. One is that if you think about sibling return relationships and if the age composition had stayed the same, we might be optimistic that 2020 would have a big run coming back to it.

34 35 36

37

38

39 40

41

The flip side or the alternative perspective is that we had a return last year that was half very young fish, which is consistent with the long-term trend we've been seeing towards younger fish in the river. The point is simply that the river right now has about 40 percent less reproduction potential per fish in the escapement than it did in the 1970s.

42 43 44

45

The reason this is important for the discussion going on today is that the escapement goals that have been set are really informed by a relationship between the recruitment produced by different spawning sizes and those relationships are typically very uncertain as we've heard with regards to

Phone: 907-243-0668

several aspects of the biology today.

They include data that were collected the last couple years, but also years back in the 1970s, which means that those relationships are conditional on observations from earlier in the time series when the average fish in the escapement was simply worth a lot more reproductively than they are currently.

The last point I'd like to make is that there's been some discussion of the utility of a 6-inch mesh size really helping us in this situation where a 6-inch mesh size should focus on capturing smaller fish and that the big ones can escape and become part of the spawning populations. While that may be true if there's lots of big fish around to avoid being caught in the 6-inch gillnets.

We need to be cognizant of the fact that fish returning to the river right now are simply a lot smaller than they used to be and those big rare highly reproductively valuable females are simply an increasingly rare part of the population and therefore an increasingly rare part of the escapement.

Thanks again for this opportunity.

(No comments)

CHAIRMAN CHRISTIANSON: Hearing none. We'll check with the Operator if there's any additional public testifiers online.

OPERATOR: Thank you, sir. The next comes from Joseph Spader. Your line is open.

CHAIRMAN CHRISTIANSON: Mr. Spader, are you online?

OPERATOR: It looks like he's dropped out of the queue, sir. The next comes from Jim Simon. Your line is open.

MR. SIMON: Thank you, Operator. Thank

you, Mr. Chairman and members of this Board for this opportunity to comment. For the record, my name is Jim Simon. I'm an independent consultant for the purposes of this call with the Kuskokwim River Inter-Tribal Fish Commission and the Tanana Chiefs Conference Hunting and Fish Task Force.

5/1/2020

6 7 8

9

10

11

12 13

14

4 5

> I first began working in the Kuskokwim watershed and learning about subsistence salmon fishing 21 years ago as an applied anthropologist for the Tanana Chiefs Conference working with establishing government-to-government relationships between the 37 Federally recognized tribes of the Tanana Chiefs Conference including the Upper Kuskokwim Tribes in the headwaters.

15 16 17

18

19

20

To address the impacts of the military facilities and the contamination associated with them on concerns regarding the impacts on chinook salmon and other salmon species in the headwaters communities of the Kuskokwim.

21 22 23

24

25

26

27 28

29

30

Subsequent to that I worked for 14 years as the Regional Supervisor of the Department of Fish and Game's Division of Subsistence responsible for the Arctic, Yukon and Kuskokwim drainages. 2007 I published the first comprehensive subsistence salmon harvest compilation assessment and methodological description covering the Kuskokwim River Subsistence Salmon Harvest Monitoring Program from the years 1989 to 2004.

31 32 33

34

35

36

37

38

39

40

During my State service I also spent 13 years as the vice chairman of the Arctic Yukon Kuskokwim Sustainable Salmon Initiative Steering Committee, which consists of the Bering Sea Fishermen's Association, the Department of Fish and Game's Division of Commercial Fisheries and Subsistence Division, the National Marine Fisheries Service, Fish and Wildlife Service, Association of Village Council Presidents, Kawerak and the Tanana Chiefs Conference.

41 42 43

44

45

46

47

48

The Steering Committee is the governance policy and funding decision-makers for the Initiative and have funded well in excess of \$20 million from United States Congress to study the salmon population dynamics, particularly of chinook salmon. Many of the results of the research funded by the Initiative are now greatly informing Kuskokwim chinook

Phone: 907-243-0668

salmon fisheries science and management, as you have been hearing from the experts testifying today.

Following my State service I worked for the Bering Sea Fisherman's Association as the chairman of the Kuskokwim Regional Planning Team charged with the development of a Kuskokwim Area Comprehensive Salmon Plan. I analyzed and assembled and described the commercial fisheries, the sport fisheries and the subsistence fisheries data from the 1970s through 2015. I authored the first Draft Comprehensive Salmon Plan for the Kuskokwim area.

12 13 14

15

16

17

18

19

4

5

6

7

8

9

10

11

I want to express my support for all three Special Actions, particularly Special Action Request 20-03. I'm going to focus the rest of my testimony on the thought that I have been giving my own experience after the Yukon Delta Refuge Manager, a meeting between the commission and the Fish and Wildlife Refuge Staff a couple days ago this week.

24

2.5

26

27

28

Wherein the Manager, when we were discussing the 2013 season, expressed the sentiment that the State, the Fish and Wildlife Service and the fishermen were at fault that season. While I'm not sure that I would be comfortable sharing that fishermen were responsible for that tragedy of the comment, I was the State Subsistence Division Regional Supervisor during that time.

29 30 31

32

33

34

35

36

I've contemplated the statement for the last couple of days and trying to assess my own culpability as a State official during that year. It was a year with a brand-new manager and it turns out that it was a very overly optimistic forecast that was not realized and I think surprised everyone. there's still a lot of concerns about it.

41

42 43

44

45

46

47

I appreciate Ben Mulligan's comments earlier that the State is always learning from experiences like that, but I want to just say I'm not a biologist, I'm an anthropologist. Considering the statements made this week about the 2013 season, I'm concerned that the 2020 Fish and Wildlife Service's strategy that was provided yesterday, which was written yesterday, did not advance any new metrics or strategies to avoid a similar Federal failure like the Refuge Manager suggested earlier this week in 2013.

Phone: 907-243-0668

I am also quite concerned that the OSM analysis and all of these discussions has not brought up my own observations from the 2019 season with the run reconstruction that is basically the single data point that's been forming the 2020 forecast.

I just remember fishermen from the Middle Kuskokwim River all the way to the headwaters last summer and hearing that there was 100,000 more chinook salmon in the river and they kept asking where they were and where they were going. I don't know if actually even the phrase ghostfish started to be discussed. There was concern that maybe some of them or a large number of them died of heat stress.

But I appreciate the Special Action Request. I do not contest the 2019 run reconstruction, but I think it's important for the Federal Subsistence Board's deliberations to really consider that I personally am not convinced that the 2019 run reconstruction is as accurate as people may be assuming because there were still difficulties in low density fish in the upper parts of the river when there should have been plenty of fish. So that is quite concerning to me.

I'm also concerned that this 2020 strategy outlined in some of the dialogue and questions raised by the Commission really causes me to be concerned that the Refuge's statutory obligations to protect the natural diversity of chinook salmon sub-stocks and restoring chinook salmon within the Kuskokwim watershed are being given lower priorities in deference to the State. That's just concerning to me.

I realize that Federal annual bonuses are measured and somewhat determined by getting along well with the State of Alaska and I just am quite concerned about the Title III, the Title VIII obligations in ANILCA, as well as the obligations outlined in the Refuge's Administration Act really should be being considered and taking a much more precautionary approach than is currently being recommended by the Fish and Wildlife Service.

Thank you very much for this opportunity to testify, Mr. Chairman.

CHAIRMAN CHRISTIANSON: Thanks. Any

questions.

2 3 4

(No comments)

5 6 7

CHAIRMAN CHRISTIANSON: Thank you for taking the time to call in today. Operator, any other public testimony online.

8 9

OPERATOR: Yes, sir. The next comes from Joseph Spader. Your line is open.

10 11 12

MR. SPADER: Thank you. Appreciate the opportunity to be able to make comments. I wanted to bring home a couple points very briefly.

14 15 16

17

18

19

20

21 22

23

13

First, I want to emphasize that the information provided by the report by Harper and Jim Boersma that was not included in the analysis is significant because it is the only information that we have to provide about the status of the run after spawning and based on juvenile productivity. Again, there was a 50 percent decrease from 2015 each year to 2018 with the final -- with those years returning currently.

24 25 26

27

28

29

30

31 32

33

37

38

39

40

41

42 43

I also wanted to follow up on a concern in regards to the Refuge Manager's 2020 management strategy where he says specifically that he believes restrictions to the June fishery after June 11th would only be necessary if cumulative passage of chinook salmon before June 11th were little to none at the Bethel Test Fishery sonar operations and the subsistence fishermen were not catching any salmon on the first driftnet opener.

34 35 36

That would be a risk prone target and that's because in the years even of Federal management 2014 through 2019, particularly 2014 to 2018, there were harvests in that opener, in the first opener, that were fairly significant and yet the run was not sufficient to provide for subsistence. I think the use of no fish before June 11th is a highly risk-prone approach. In other words, it does not provide protections for chinook salmon under ANILCA.

44 45 46

47

48

In summary, we've heard a lot of discussion about the forecast and specifically forecast uncertainty. We now know that the true forecast, that is number of fish that may actually return, is highly

Phone: 907-243-0668

uncertain. Therefore, given that high degree of uncertainty about the number of fish, what is being asked in Special Action 20-03 is simply that the chinook salmon season begin under Federal management in order to provide assurances that the actual 2020 abundance is sufficient to meet the conservation and priority use provisions of ANILCA.

In other words, Mr. Albertson's Special Action Request is trying to help the Federal Subsistence Program be more risk adverse. In summary, the Federal Subsistence Board cannot safely rely on a highly uncertain forecast to provide reasonable assurances to Federally qualified users that that 2020 run will be sufficient to ensure the provisions of ANILCA will be upheld.

 The only real way, given the uncertainty and the pattern of decline, for the Federal Subsistence Board to assure the provisions of ANILCA will be met is to actually provide early in-season assessment and if that run abundance is adequate to turn it over to the State at that time, but not before.

That's all my comments.

Thank you very much for the opportunity

to speak.

CHAIRMAN CHRISTIANSON: Thank you for taking the time to call in, Mr. Spader. Any questions from the Board for Mr. Spader.

(No comments)

CHAIRMAN CHRISTIANSON: All right. Hearing none. Thanks again for calling in. Operator, is there anybody online that would like to testify today?

OPERATOR: Thank you. The next comes from Karen Linnell. Your line is open.

MS. LINNELL: Good afternoon. Thank you, Board and Mr. Chair for the opportunity to speak to you. I am Karen Linnell, the Executive Director for the Ahtna Intertribal Resource Commission and I am speaking in support of the Special Action Request to close the waters to non-Federally qualified users.

I just wanted to say that the Federal trust responsibility is there and you cannot pass it off to the State of Alaska to manage. Unlike Alissa, who spoke earlier, I believe that the State's management has gotten us into this crisis stage and that subsistence uses have been severely limited in the last several years because of that mismanagement.

7 8 9

10

11 12

13 14

15

4

5

6

Folks there on the Kuskokwim have been trying to conserve and regenerate that population there with their conservative actions and have asked for assistance in this. The State's resistance to this co-management effort and/or the sharing of the information, we had the same issue here a couple years ago when we were told our chinook return was going to be low and it was based on previous years' data.

16 17 18

19

20

21 22

23

We sat here and went through our own history of the weather, of the water. We had a flood the year Grandma Katie John died and it was five, six, seven years later they're telling us we were going to have a low return. We ended up having a record return because they weren't taking into consideration all the other factors that was happening.

24 25 26

27 28

29

One of the things with State escapement levels as well that we had here is that management was going to lower the escapement goals so that they can continue to harvest. So we had to fight long and hard to stop them from doing that.

30 31 32

33

34

35

36

I'm not sure what happens there on the Kuskokwim, but this is just an example of how the State manages. We need to have a sustained yield and that often gets misinterpreted and interpreted as we need to keep taking at the same level regardless of the sustainability of that.

41

42

43 44

45

46

So I disagree with Ms. Alissa to let the State do their job. I think the Federal government has a responsibility to manage these resources. The sharing of the data is there. I see it here. The conversations are happening. You have an in-season management team that meets every week to discuss what's happening almost daily sometimes I think. They're the ones with their boots on the ground there and they see what's happening.

Phone: 907-243-0668

47 48

I really dislike the Federal agencies

and their let's kind of hands-off approach into management. To me it's kind of like they don't want to get their hands dirty, you know, or they don't want the responsibility. It's too much.

The other thing that I noticed while I was visiting there in Aniak last year and listening to some of the stories there it was -- there's a boundary line that goes across the river and if you go up north of that, it's Federal land and Federal jurisdiction, and you cross that line again it's State jurisdiction.

The Federal responsibility is from the headwaters to the ocean and back and not on this checkerboard pattern. That responsibility is for the entire fishery stock and you need to take that ownership and work with it and manage it.

Thank the good Lord here that our river happens to be the boundary for the Wrangell-St. Elias National Park and, therefore, the jurisdiction is for the entire river. Otherwise we'd be in the same situation.

I just think that you need to man up and manage and take care of the salmon stock in the way that it should be so that it can replenish. I just thank you for your time and your consideration.

CHAIRMAN CHRISTIANSON: Thank you, Karen, for calling in. Any questions for Karen?

(No comments)

CHAIRMAN CHRISTIANSON: We appreciate you taking the time today, Karen, to call in. The best to you. Operator, is there another public online that would like to testify at this time?

OPERATOR: Yes, sir. Thank you. The next is Barb Carlson. Your line is open.

MS. CARLSON: Yes, this is Barb Carlson. Can you hear me?

47 CHAIRMAN CHRISTIANSON: Yes, Barb, you 48 have the floor.

MS. CARLSON: Okay. Thank you. I'm Barb Carlson. I live on the Upper Kuskokwim River just outside of Sleetmute and I'm a subsistence fisherman. I also sit on the Stony/Holitna Advisory Committee, so that's a State ADF&G organization, and I have a seat on the Kuskokwim River Salmon Management Working Group. So I've got some knowledge of salmon on this river.

5/1/2020

1 2

I'd like to start by saying I am not in favor of any of the Special Action Requests, 01, 02 or 03. I agree wholeheartedly with all the good reasons given for those requests. Our king salmon are in trouble. They are still in need of conservation. The risk is terrible for them. We're not getting enough. We're not meeting ANS. We need to be concerned about our kings. We're not out of the woods yet. Those are all very good reasons.

My problem with the Special Action Request is that I'm not sure that Federal management is the solution. I think the State management can do it. My problems with the Federal management that these Special Action Requests would grant to the lower part of the river has to do with what I've seen happen in the past.

There is little or no enforcement. They may come out with the very best of regulations, but for whatever reason, particularly last year because of the John Sturgeon decision at the Supreme Court level, there was no Federal control in terms of law enforcement over having only Federally qualified users out fishing, making sure that the correct nets were being used at the correct time so that nets weren't in the river when they were supposed to be.

I think all the things that are put in writing and all the things that were decided were wonderful, but I didn't see that happening under Federal management. So it's like there were good decisions, but they didn't have the follow through and that concerned me greatly. I guess I don't see that changing this year.

Being a person who lives in the upper part of the river, I've always lived under State management. I know that lots and lots of folks find it very confusing to have one type of management in one part of the river and another management by the State

in the upper part. I think the previous person who spoke put it very well about the line in Aniak. cannot imagine living in Aniak and having different regulations right within your own town depending on which waters you were fishing in.

5 6 7

8

9

10 11 12

13

14

15

16 17

4

I think it's confusing. I think it's unnecessary. I think the State can do a good job on the chinook or as good a job as can be done in these times of climate change. I don't think they want to have us lose our chinook. I don't think they're the bad guys. I think it would be better under State management than under Federal management. I think that the people who want it to be under Federal management have all the right reasons for that. I just don't think I'm seeing the outcome under the Refuge supervision as getting them anywhere near what they want and I think the State can do it.

18 19 20

Thank you for your time and for listening to me.

21 22 23

24 25

CHAIRMAN CHRISTIANSON: Thank you, Barb. Appreciate you taking the time to call in and give us your perspective today. Any questions from the Board.

26 27

(No comments)

28 29 30

31

32 33

CHAIRMAN CHRISTIANSON: All right. Hearing none. Again, appreciate you calling in and sharing that with us. Operator, is there anybody else online who would like to be recognized for public testimony at this time?

34 35 36

37

38

OPERATOR: Thank you. The next comes from Chariton Epchook. Your line is open. It looks like they've disconnected from the call. The next comes from Evan Nikolai. Your line is open.

39 40 41

42

43

44

45

46

47

MR. NIKOLAI: Hello. Thank you very much for allowing me, Mr. Chairman, to address you and the Federal Subsistence Board. I'd like to also send my gratitude for all of the Staff that are diligently addressing the documents and also the Special Action Request documents and then conferencing that was necessary to be able to have the Organized Village of Kwethluk representative speak on their behalf.

Phone: 907-243-0668

I wanted to thank the Board for allowing us to have this time for public to have their comments be made. The Organized Village of Kwethluk under the Kwethluk IRA Council has participated in many conferences and provided written statements and signed on their own behalf to participate in these public concerns and for many years all of our elders have made comments in regards to making sure that our communities here in the Kuskokwim Delta are trying to conserve the fish and their essential needs, which are to provide food on their table.

11 12 13

14

15

16

17

18

19

20

21 22

23

10

1

2

4 5

6

7

8

9

Then to allow for the Special Action Request to be submitted on behalf of the Organized Village of Kwethluk. I appreciate this time for you to consider the Organized Village of Kwethluk's Special Action Request so that we're continuing the effort to ensure that the people in our area are represented and that the needs of the village and the communities that surround our community are allowed to continue their traditional and customary practices that enables them to provide fish on their racks and to allow them to bring salmon in their places of gathering them and preparing them for consumption.

24 25 26

27 28

29

30

31 32

33

34

The continued effort that the Federal Subsistence Board has made to ensure that tribes are able to participate in these processes is commendable and we applaud the Board for their efforts to allow us to be able to at least make a comment about how important it is to continue this effort to abide by the laws that the Federal government has allowed the people in our area to subsist and bring their livelihood of salmon and all of their needs to be met for a short period of time.

35 36 37

38

39

40

41

42 43

44

45

Most of the salmon that are gathered by subsistence users are being capped through limitations of when the people can go out and then even the idea that there are limitations of mesh sizes are another factor. The ability that the government has allowed us to be able to do, which is to participate and make comments just as we are doing today, I support your efforts and then push forward that the Organized Village of Kwethluk's Special Action Request be honored.

46 47 48

49 50

And thank you for the time that you have allowed me to speak on behalf of the community

Phone: 907-243-0668

```
Page 70
     here.
 2
 3
                     Thank you very much.
4
5
                     CHAIRMAN CHRISTIANSON: Thank you for
 6
     taking the time to call in today. Are there any
7
     questions by the Board?
 8
9
                     (No comments)
10
11
                     CHAIRMAN CHRISTIANSON: Hearing none.
12
     Operator, is there anybody else online who would like
13
     to be heard?
14
15
                     OPERATOR: The next comes from Chariton
16
     Epchook. Your line is open.
17
18
                     MR. EPCHOOK: Thank you.
                                               I'm Chariton
19
     Epchook, chairman of Kwethluk. We got cut off just
     when we got called to testify. Thank you for giving me
20
21
     this opportunity to testify, Mr. Chairman and Board.
22
23
                     Kwethluk, Incorporated supports all
24
     three of the Special Action Requests and requests that
2.5
     you as the Board approve to Federalize the Kuskokwim
26
     River which is within the Yukon Delta National Wildlife
27
     Refuge as it has done in the previous years. It's only
28
     appropriate for U.S. Fish and Wildlife to manage the
29
     whole river. Not by sections, but the whole river
     within this Refuge.
30
31
32
                     We would like to see the same openers
33
     that we have seen in the previous year with the same
     restrictions that were set. If we are to use 25
34
35
     fathoms, we want to see 25 fathoms being used
36
     throughout the Kuskokwim River. We felt that we were
37
     the only
38
     person on the Kuskokwim River, the Middle Kuskokwim.
39
     We felt like we were restricted more than the lower
40
     portion of the river. Most of the people here in
41
    Kwethluk did not like that and we would like to see
     that the whole river, if there's restrictions, that
42
43
     they use 25 fathoms.
44
45
                     That's about it.
46
47
                     Thank you very much for giving me this
48
     time to testify.
49
50
```

5/1/2020

Page 71 CHAIRMAN CHRISTIANSON: Thank you. 2 Thank you for taking the time to call in. questions from the Board. 4 5 (No comments) 6 7 CHAIRMAN CHRISTIANSON: All right. 8 Appreciate it again. Operator, anybody online that 9 would like to be recognized. 10 11 OPERATOR: Thank you. The next comes 12 from Bruce Urban. Your line is open. 13 14 MR. URBAN: Hello. Thank you. Can you 15 hear me okay? 16 17 CHAIRMAN CHRISTIANSON: Yes. You have 18 the floor. 19 20 MR. URBAN: Thank you, Chairman. 21 Members of the Board and Staff. My name is Bruce Urban 22 and I work for the Tanana Chiefs Conference, Hunting, 23 Fishing, Gathering Task Force. 24 2.5 Just to start off, Alaskan Natives 26 learn respect from our elders in the community. 27 take great care of the land, animals, and salmon 28 because it's our way of life. We have heard previously 29 we are witnessing declining fish population. Kuskokwim 30 chinooks are fighting for survival and we see this 31 though science and Native knowledge. These chinooks 32 give themselves to Federally qualify users so they can survive and feed there families. 33 34 35 This is a historical circle. 36 connection that has been shared for thousands of 37 generations. We need to show the chinook and Federally 38 qualified users the greatest amount of respect and 39 honor the proposals put forth today. It is too soon to 40 open the opportunity which should close Federally 41 public waters of the Kuskokwim River Drainage to the 42 harvest of chinook salmon except by Federally qualified 43 subsistence users. 44 45 I support all Fishery Special Action 46 Requests FSA20-01, 02, 03 because they honor the 47 chinook and the Kuskokwim Federally qualified users. 48 We need to support our Kuskokwim Federally qualified

user and their food security issue because they are the

49

Page 72 ones who have sacrificed so much to honor these chinook 2 salmon. 3 4 In closing, I would like thank you 5 Chairman and members of the Board and Staff for 6 listening to my testimony. 7 8 Thank you. 9 10 CHAIRMAN CHRISTIANSON: Thank you for 11 calling in today. Any questions from the board? 12 13 (No comment) 14 15 CHAIRMAN CHRISTIANSON: All right. 16 Hearing none. The best to you. Operator, is there 17 anybody else that would like to recognized. 18 19 OPERATOR: Thank you, sir. The next 20 comes from Brooke Woods. Your line is open. 21 2.2 MS. WOODS: Good afternoon. can you 23 hear me? 24 2.5 CHAIRMAN CHRISTIANSON: Yes, Brooke, 26 you have the floor. 27 28 MS. WOODS: Hi my name is Brooke Woods. 29 I am from Rampart, Alaska on the Yukon River. I'm a 30 fisheries science student at University of Alaska 31 Fairbanks raising five kids and working for TCC Hunting 32 and Fishing Task Force. I also serve as a chair for the Yukon River Intertribal Fish Commissions and at is my 33 34 responsibility to testify in support of all three 35 Fisheries Special Action for our TCC tribe and our 36 relatives along the Kuskokwim River. 37 38 The Tanana Chiefs Conference is an 39 Alaska Native non-profit corporation charged with 40 advancing tribal self-determination and enhancing 41 regional Native unity. Our region covers an area of 37 42 percent of the entire state with six subregions, one 43 being the Upper Kuskokwim Subregion. That includes the 44 villages of McGrath, Medfra, Nikolai, Takotna, and 45 Telida. 46 47 The Kuskokwim River tribes request to 48 maintain the Federal closure to all but Federally 49 qualified users for chinook salmon fishing for the 50

conservation and priority consumptive use under the provision of Title VIII, Section 804 of ANILCA by closing Federally public waters of the Kuskokwim River for harvest of chinook salmon by Federally qualified subsistence users at the beginning of the 2020 salmon run.

6 7 8

9

10

11 12

13

14

15

4

5

Chinook salmon are not yet recovered. Returns from 2011 through 2018 has been very low. Tribes need the ability to have conservation measures in place to rebuild the stocks. Tribes understand and see firsthand threats to the recovery of chinook salmon. Local observations have seen a reduction in body size of chinook salmon and don't want to see threats to stop diversity, a foundation of sustainable and resilient resource management.

16 17 18

19

20

21 22

23

24

2.5

This information comes from a paper by Conners, et al, which identifies several Kuskokwim chinook salmon substocks that currently less productive and are at risk of unintentional overharvest under higher exploitation rates within the mainstem of mixed stock fisheries. This paper also states the harvest policies focused on meeting minimum subsistence needs are unlikely to jeopardize long term perspectives for basin-wide sustainable use.

26 27 28

29

30

31 32

These are important factors and reasons to maintain the Federal closures to all but Federally qualified users for chinook salmon fishing. Tribes are experiencing and adapting to the impacts and unpredictability of climate change on migrating salmon harvesting and processing.

33 34 35

36

37

38

39

40

41

Although the State's forecast is exceedingly high, tribes seek to continue conservation measures through the provisions of Title VIII, Section 804 of ANILCA. Turning management over to the State would be detrimental to the five years of accomplishments done by the tribes. Subsistence priority under ANILCA are provisions the State are unable to manage by and I say that very respectfully.

46

47

48

The Special Actions provide for equitable distribution of the salmon and allow for salmon to make it to the headwaters. Getting salmon to the headwaters is essential for the tribes along the Kuskokwim for today's fishermen and women and the next generation. Please allow the run to rebuild while

Phone: 907-243-0668

meeting the needs of the Federally qualified users.

There is research, scientific resources being incorporated into indigenous knowledge and ways of life, which is best for the health of the salmon and the people. This opportunity provides for food security and food sovereignty. The Inuit-Circumpolar Council defines food security as the right of Alaskan Inuit to define their own hunting, gathering, and fishing lands and water policies. The right to define what is sustainable socially, economically and culturally appropriate for the distribution of food and to maintain ecological health. The right to obtain and maintain practices that enter access to tools needed to obtain, process, store and consume traditional foods.

Furthermore, Congress has recognized the rights of tribes to have the greater say over the development and implementation of Federal programs and policies that directly impact on them and their tribal members. It did so by enacting two major pieces of legislation that together embodied the importance of concepts of tribal self-determination and self-governance.

Through these laws Congress accorded tribal governments the authority to administer themselves programs and services usually administered by the BIA for their tribal members. It also upholds the principles of tribal consultation whereby the Federal government consults with tribes on Federal actions, policies, rules or regulations that will directly affect them. This information can be found on the U.S. Department of Interior Indian Affairs website.

Today I ask the Federal Subsistence Board to support these three Fisheries Special Actions. Baasee'. Thank you for the work that you do and baasee' to those Kuskokwim tribes for submitting these invaluable requests for all those who depend on this precious salmon run that sustained our people for thousands and thousands of years.

CHAIRMAN CHRISTIANSON: Thank you. Any questions from the Board?

1 (No comments) 2 3 CHAIRMAN CHRISTIANSON: All right. 4 Appreciate you taking the time to call in today. 5 Operator, is there anybody else online who would like to be recognized? 7 8 OPERATOR: Thank you, sir. The next 9 comes from Jonathan Samuelson. Your line is open. 10 MR. SAMUELSON: Thank you. Can you 11 12 hear me? 13 14 CHAIRMAN CHRISTIANSON: Yes. 15 the floor. 16 17 MR. SAMUELSON: Thank you. My name is 18 Jonathan Samuelson. I was raised in Bethel. I grew up 19 in McGrath on the Kuskokwim. As a product of the 20 river, I'd like to take a moment to thank you for 21 honoring Ray Collins and his legacy today. We will 22 feel his void for a very long time. I will make sure, 23 as I'm sure Kevin will who spoke earlier, to let his 24 family know that we are all thinking of them during

30

31 32

33

34

35

36 37 to come.

25

I am a tribal citizen of the Native Village of Georgetown, which is smack dab in the middle of the Kuskokwim. My family spans the entire river. We have been taking care of the salmon and fishing from this river for generations. I am the appointed commissioner to the Kuskokwim River Inter-Tribal Fish Commission for the Native Village of Georgetown, although I represent just myself today. I share that with you to express my familiarity with the history and issues before us.

this time. His words and his advocacy will echo

through our voice and through our work for many years

38 39 40

41

42 43

44

Our tribal citizenship also spans the entire river as we have members from our tribe from the headwaters down to Bethel and beyond. We have stewarded fish in all parts of the river and across any and all jurisdictional boundaries. I speak in the best interests of all of our citizens and all of my family.

45 46 47

48 49

50

We know that there is -- nobody thinks that the run is rebuilt at this point. We know that. We are still in a conservation mode, but we've moved

Phone: 907-243-0668

beyond that I feel like on the river. As long time stewards of the run we are operating under a mindset of rebuilding the stock of the run and maintaining stock diversity.

4 5 6

7

8

9

10

11

12 13

I'm speaking today in favor of all three Special Actions for many of the reasons that have been shared by people before me. We have heard numbers and the science that supports all of the Special Actions, but for us there's more to it than just numbers. We have a deep spiritual relationship with these salmon and that is part of their responsibility of management is to make sure that those relationships are kept intact.

14 15 16

17

18

19

20

We've heard the State's forecast. know that that forecast can be up to 100,000 fish off. It happened last year. We lucked out that it was 100,000 fish in the positive. Had it gone the other way things would have been very very devastating and we would be telling a different story this year.

21 22 23

24

25

26

27

28

29

It is difficult for us to look in the freezer and decide whether or not we can eat chinook today, whether or not there's chinook in that freezer, to open the cupboard and count jars, to wonder if our aunties have enough to get through the winter, do our grandmas have enough. To decline the opportunity to share with people, which is a huge part of our culture, because we're not able to meet those needs.

30 31 32

33

34

35

36

37

There's just too much uncertainty in the management by an agency that can't provide security and assurance that local needs are being met. Our river is currently flooding as we speak. Houses are being lost and damaged. Today is a little hectic in my brain, so I apologize for not having my thoughts all in a row.

38 39 40

41

42 43

44

I've heard from this Board that decisions should be left to the local and should be made on the river. Supporting these Special Actions is the best way to assure that that process could take place.

Phone: 907-243-0668

45 46

I'd like to end my comments with that.

47 48

Thank you.

```
Page 77
                     CHAIRMAN CHRISTIANSON: Thank you.
 2
     Thank you for taking the time to call in today.
     Questions from the Board.
4
 5
                     (No comments)
 6
 7
                     CHAIRMAN CHRISTIANSON: All right.
8
     Appreciate that. And the best to you. Operator, does
9
     that conclude public testimony today?
10
11
                     OPERATOR:
                                Thank you, sir.
12
13
                     CHAIRMAN CHRISTIANSON: All right.
14
     That concludes the public testimony today for this
15
     Special Action Request that we have before us. With
     that I'll open up the floor for Board discussion. Any
16
17
     questions for Staff.
18
19
                     (No comments)
20
21
22
                     CHAIRMAN CHRISTIANSON: All right.
23
     Hearing no Board discussion or questions on that I'm
     going to open up the floor for Board action on this
24
25
     Special Action Request.
26
27
                     MR. SIEKANIEC: Mr. Chair. Greg with
28
     the Fish and Wildlife Service.
29
30
                     CHAIRMAN CHRISTIANSON: Yes, Greg, you
31
    have the floor.
32
33
                     MR. SIEKANIEC:
                                     Thank you, Mr. Chair.
34
     For starters I'd like to thank everyone for the
35
    testimony that's been provided and the public input and
     the work of all the scientists and the relationships of
36
37
     folks out on the Kuskokwim River.
38
39
                     Mr. Chair and Board members, I move to
40
     approve FSA20-03 and take no action on FSA20-01 and
41
     FSA20-02. If I get a second, I will provide my
42
     justification to oppose my motion.
43
44
                     MR. PELTOLA: Second. BIA.
45
46
                     MR. SIEKANIEC: Thank you, Gene.
47
     OSM analysis provided a comprehensive review of the
48
     science used by biologists and managers to model
49
     pre-season forecast and inform the management of the
50
```

Page 78

Kuskokwim River fishery.

The Kuskokwim River fishery is a dynamic and complicated system and that is demonstrated by both today's and previous years discussions and the testimony that we hear. We need to base our Board decision on the best available science and within the context of meeting conservation concerns and providing for the continuance of subsistence uses.

The OSM analysis and the ISC comments identify that Federal management of the river I believe is not warranted to support healthy populations of chinook salmon and to provide for the continuance of subsistence needs.

If the preseason run materializes as predicted, escapement goals of 65,000 to 110,000 should be met or exceeded and historic harvest levels of up to 110,000 fish may be achieved without jeopardizing the health of chinook salmon populations.

The State has indicated that it plans to follow the precautionary model from 2019 and that is to repeat a (phone cutout) with identical weekly harvest opportunities. After June 11 the Alaska Department of Fish and Game will work with the Federal in-season manager, Kuskokwim River Inter-Tribal Fish Commission and other stakeholders to determine when harvest opportunities should be provided.

Closing the Kuskokwim drainage to only Federally qualified users on June 1 would be an unnecessary restriction to non-subsistence users. The number of non-subsistence users that would fish for chinook salmon if open for all users under State management is frankly unknown, but it's likely low given the travel and the COVID-19 issues associated with rural communities.

Historic harvest records indicate that when all users were allowed to harvest and when there were no restrictions to harvest methods and timing the maximum harvest ever documented was 110,000 chinook salmon.

Given the implementation of the precautionary measures of a front-end closure, restrictions to 6-inch mesh nets and probable windowed

Computer Matrix, LLC

Computer Matrix, LLC Phone: 907-243-0668 135 Christensen Dr., Ste. 2., Anch. AK 99501 Fax: 907-243-1473

openings, it is unlikely that 110,000 chinook could be harvested, resulting in more escapement.

3 4

5

6

7 8

9

The declines in escapement quality is not specific to the Kuskokwim River. It is occurring among most Alaska stocks. Based on an escapement quality report by the Arctic Yukon Kuskokwim Sustainable Salmon Initiative, as long as 6-inch or less mesh gear is utilized for the 2020 season and beyond, the need to escape more fish is not necessary to resolve chinook salmon escapement quality issues.

11 12 13

14

15

16

17

10

Similarly, salmon stock diversity is also a recent area of interest by many researchers. Recent research on stock diversity by Braden Conners, as highlighted in the OSM analysis, indicates that stock diversity issues are minimal as long as harvest goals do not exceed 150,000 chinook salmon.

18 19 20

21 22

Additionally, current management actions for the Kuskokwim with the front-end closures and closure of harvest on salmon-bearing tributaries further address and protect stock diversity.

23 24 2.5

26

27

28

29

A concern regarding forecast is important as some forecasts show larger potential ranges than others. Despite these forecasts having larger ranges they seem to have a similar story. All forecasts have midpoints, about 200,000 chinook salmon.

30 31 32

33

34 35

36

37

The larger minimal forecast also indicated that it is very unlikely, perhaps less than 5 percent change, that run abundance in 2020 will return to run abundance levels experienced between 2010 and 2018 or less than 135,000 chinook salmon. This certainly provides me confidence in the current preseason forecast.

38 39 40

41

42

43

44

45

46

47

The managers and users will have resource information to determine if the run is coming in as projected. Resources include the sonar, Bethel Test Fishery and harvest fish subsistence opportunities themselves and the high degree of communications along the river. If all of these sources indicate a small chinook salmon run, the Refuge Manager, as the In-season Manager, can close the fishery out of an abundance of caution.

Phone: 907-243-0668

The established cooperative working groups that have been successfully formulated between State, Federal, Tribal and other user groups will continue to cooperate and provide the essential input needed to provide for subsistence harvest while maintaining healthy chinook salmon populations.

6 7 8

9

10

11

12 13

14

15

16

1

2

4 5

> The Board has delegated the authority to the Yukon National Wildlife Refuge Manager to issue emergency closures when warranted. The Yukon Delta National Wildlife Refuge Manager (muffled) will continue to coordinate with the Kuskokwim River Inter-Tribal Fish Commission, Regional Advisory Councils, Alaska Department of Fish and Game, Kuskokwim River Salmon Working Group and others as needed to ensure the collaborative decision-making continues throughout the season.

17 18 19

20

21 22

25

26

27 28

29

In closing, if there's strong evidence to support conservation concerns, I also believe the Office of Subsistence Management would have supported the Special Actions requesting Federal management.

23 24

I believe that one thing is certain, it takes a strong cooperative relationship among the subsistence users, the working groups, State Fish and Game, the Federal In-season Manager and Refuge Staff at the Yukon Delta National Wildlife Refuge. As you already heard, the decision is being made as close to the resource as possible.

30 31 32

Thank you, Mr. Chair.

33 34 35

CHAIRMAN CHRISTIANSON: Thank you, Greg. With that I'll open up the floor for Board discussion.

36 37 38

MR. PELTOLA: Mr. Chair. BIA.

39 40

CHAIRMAN CHRISTIANSON: Gene, you have the floor.

41 42 43

44

45

46 47

MR. PELTOLA: Thank you, Mr. Chair. Based on the motion I'd like to address a couple points. One, I don't feel that it was a complete and comprehensive review in the analysis. Significant aspects of it were not addressed as identified earlier on.

Phone: 907-243-0668

48 49

The best available science may or may not be utilized, although the forecast that we have been utilizing have missed the mark by up to 100,000 fish.

 As for State management, I am not against State management, although the scenarios that have presented show that there would and will most likely be restrictions on harvest. Therefore, the Federal Subsistence Program should provide for the rural preference and the priority consumptive use. This can only be assured via Board action by limiting the harvest of Federally qualified users.

I've heard numerous mentions of if the run progresses to be not as strong as forecasted or comes in weak, that in-season management action can be taken and to date that has not been expressed by the in-season manager outside of the initial action by the Federal Subsistence Board to initiate a fishery for Federally qualified users only.

Thank you, Mr. Chair.

CHAIRMAN CHRISTIANSON: Thank you, Gene. Any other Board discussion.

MS. PITKA: This is Rhonda Pitka.

 $\label{eq:CHAIRMAN CHRISTIANSON: Yes, Rhonda,} % \end{substitute} %$

 $\,$ MS. PITKA: I would like to amend the motion to support FSA20-01 and 20-02 also. Thank you.

CHAIRMAN CHRISTIANSON: You want to make a motion to amend the original motion?

MS. PITKA: Yes.

CHAIRMAN CHRISTIANSON: What would that amendment be, Rhonda?

MS. PITKA: The amendment would be to support FSA20-01 and 20-02 also, in addition to supporting 20-03. Thank you.

 $$\operatorname{MR.}$ PELTOLA: Mr. Chair. Can I ask a clarifying question.

```
Page 82
 1
                     CHAIRMAN CHRISTIANSON: Yes, go ahead,
 2
    Gene.
 3
4
                     MR. PELTOLA: Thank you, Mr. Chair.
5
    Rhonda, your motion was to support Fisheries Special
 6
     Action 01 and 02 as well. In 01 and 02 they call for
7
     Federal management starting June 1st and FSA20-03 calls
8
     for it at the beginning of the run. How would you
9
     rectify that discrepancy between the two dates?
10
11
                     MS. PITKA: I think we heard last year
12
    and this year that they want Federal management of the
13
     run early.
14
15
                     MR. PELTOLA: Yeah, I understand that,
16
    but if we -- I am about to make a second to your
     amendment although we'd have to work out the difference
17
18
    between FSA20-03 which says at the beginning of the
19
    run, i.e. when king salmon show up, versus the firm
20
     dates in 01 and 02 which is June 1st.
21
22
                     Thank you, Mr. Chair.
23
24
                     CHAIRMAN CHRISTIANSON: Rhonda, as he's
25
    saying, he wants to make a second to your motion, but
26
    how would we take care of the discrepancy between those
27
    two dates there to support it because they would be
28
    different. I take it the king show up somewhere around
29
    mid June.
30
31
                     MS. PITKA: I believe the language said
32
    the beginning of the run or June 1st, whichever was
33
    earliest, is that correct or did I read that
34
    incorrectly?
35
36
                     MR. PELTOLA: Even if it is incorrect,
37
     I could live with that statement.
38
39
                     CHAIRMAN CHRISTIANSON: I think you
40
    answered the question, Rhonda. June 1st or whichever
41
    is earlier.
42
43
                     MR. PELTOLA: Second the amendment.
44
    BIA.
45
46
                     CHAIRMAN CHRISTIANSON: There's an
47
    amendment to the original motion to support the Special
```

Action Request. Now there is a motion on the floor to

amend it to include the other two Special Action

48 49

```
Page 83
     Requests with a date to be June 1 or when the first
     king arrives to make it a Federally managed fishery.
     That's the motion on the floor now to amend the
 4
     original motion.
 5
 6
                     Any discussion from the Board.
 7
8
                     (No comments)
9
10
                     CHAIRMAN CHRISTIANSON: Hearing no
11
     discussion. We'll call for a question on the
12
     amendment.
13
14
                     MR. PELTOLA: Question. BIA.
15
16
                     CHAIRMAN CHRISTIANSON: The question
17
     has been called. Roll call, Tom, please, on the
18
     amendment to the original motion.
19
20
                     MR. DOOLITTLE: Mr. Chair.
                                                 This is
21
     Fisheries Special Action 20-01, 02, 03 amendment to the
22
     original motion provided by Fish and Wildlife Service.
23
     The vote on this amendment is to support Fisheries
     Special Action 20-01 and FSA20-02 in addition to
24
25
     FSA20-03 with Federal management starting the beginning
26
     of the run or June 1, whichever is earlier.
27
28
                     I will start with Bureau of Indian
29
     Affairs on this amendment for a vote.
30
31
                     MR. PELTOLA: Support.
32
33
                     MR. DOOLITTLE: Gene is support.
34
35
                     Rhonda Pitka.
36
37
                     MS. PITKA: Support.
38
39
                     MR. DOOLITTLE: Is Public Member Brower
40
     with us?
41
42
                     (No response)
43
44
                     MR. DOOLITTLE: No Public Member
45
     Brower.
46
47
                     National Park Service, Joshua Ream.
48
49
                     MR. REAM: The Park Service supports
50
```

```
Page 84
     the amendment to the motion.
2
 3
                     MR. DOOLITTLE: Thank you, Josh.
4
                     U.S. Forest Service, David Schmid.
5
 6
7
                     MR. SCHMID: Yeah, Forest Service also
8
     supports the amendment to the original motion.
9
10
                     MR. DOOLITTLE: Thank you, Dave.
11
12
                     BLM, Chad Padgett.
13
14
                     MR. PADGETT: I'll support as well.
15
     Thanks, Tom.
16
17
                     MR. DOOLITTLE: You bet, Chad.
18
19
                     U.S. Fish and Wildlife Service, Greg
20
     Siekaniec.
21
22
                     MR. SIEKANIEC: Thank you, Tom.
23
    oppose.
24
25
                     MR. DOOLITTLE: Thank you, Greg.
26
     Chairman Christianson.
27
28
                     CHAIRMAN CHRISTIANSON:
                                             I support.
29
30
                     MR. DOOLITTLE: The amendment passes.
31
                     CHAIRMAN CHRISTIANSON: All right.
32
33
     That will bring us back to the original motion now
34
     amended. So if you want to read that back to me, Tom,
35
     please.
36
37
                     MR. DOOLITTLE: Right. The Fish and
     Wildlife Service moved to approve Fisheries Special
38
39
     Action 20-03 and take no action on FSA20-01. The
40
     approved amendment is to support FSA20-01, 20-02 in
41
     addition to FSA20-03 with Federal management starting
42
     at the beginning of the run or June 1, whichever is
43
     earlier.
44
45
                     CHAIRMAN CHRISTIANSON: Thank you.
     would now open up the floor for any further Board
46
47
     discussion or deliberation on the motion.
48
49
                     (No comments)
50
```

```
Page 85
                     CHAIRMAN CHRISTIANSON: Hearing none.
2
     We'll call for the question.
4
                     MR. PELTOLA: Question.
5
 6
                     CHAIRMAN CHRISTIANSON: The question
7
     has been called. Roll call, Tom, please.
 8
9
                     MR. DOOLITTLE: This is the amended
     original motion from the Fish and Wildlife Service to
10
11
     approve FSA20-03 and take no action on FSA20-01 and
     FSA20-02. Now combined as amended in support of
12
13
     FSA20-01 and FSA20-02 in addition to FSA20-03 with
14
     Federal management starting the beginning of the run or
15
     June 1, whichever is earlier.
16
17
                     Rhonda Pitka.
18
19
                     MS. PITKA: Support.
20
21
                                     Thank you, Rhonda.
                     MR. DOOLITTLE:
22
23
                     Bureau of Indian Affairs, Gene Peltola.
24
2.5
                     MR. PELTOLA: BIA supports for our
26
     previously articulated reasons based on the original
27
     motion in addition to deference to the Western Interior
28
     and Yukon Delta RACs.
29
30
                     Thank you, Mr. Chair.
31
32
                     MR. DOOLITTLE: Thank you, Gene.
33
34
                     National Park Service, Joshua Ream.
35
36
                     MR. REAM: Thank you. The National
37
     Park Service votes to support the motion to adopt
     Fisheries Special Action FSA20-01, 02 and 03. To close
38
39
     the Kuskokwim River to chinook salmon harvest by
40
    non-Federally qualified users for the 2020 season until
41
    such time that in-season indicators suggest that
42
     escapement goals and harvest needs will be met or
43
     exceeded.
44
45
                     We appreciate the development of more
46
     accurate models to predict run size and while we hope
47
     the predictions for a strong run in 2020 hold true, a
48
     precautionary approach is warranted given that there
49
     has only been a single year of strong returns among the
50
```

past nine. Other stressors on the population are cause for concern as is the maintenance of stock diversity.

5/1/2020

3 4

5

6

7

8

Additionally, a trend towards smaller fish has implications for productivity, but also requires greater effort to meet subsistence needs. We therefore believe that there are continuing concerns for those conservation of the species and the continuation of subsistence uses.

9 10 11

12 13

Restrictions to Federally qualified subsistence users, including the 804 subsistence user prioritization, should be lifted prior to the fishery being opened to all users.

14 15 16

17

18

19

20

21 22

The National Park Service supports the existing delegation of authority to allow the Refuge Manager to open the fishery if conditions allow and we echo the need for the long anticipated management plan to be completed in coordination with the Kuskokwim River Inter-Tribal Fish Commission and other partners, thus providing guidance in the form of thresholds that can be used for in-season management.

23 24 25

Thank you, Mr. Chair.

26 27

MR. DOOLITTLE: Thank you, Dr. Ream.

28 29

U.S. Forest Service, David Schmid.

30 31

32

33

34

35

36

37

38

MR. SCHMID: Yeah, the Forest Service is also going to support and as extremely well-articulated by the National Park Service, I won't repeat most of that, other than I would also support listening and hearing from what I heard was widespread support throughout the area including the Yukon-Kuskokwim Delta RAC and the Western Interior RAC and the Kuskokwim Inter-Tribal Fish Commission that does represent over 30 Federally recognized tribes.

39 40 41

Thank you.

42

MR. DOOLITTLE: Thank you, Dave.

43 44 45

Bureau of Land Management, Chad

46

Padgett. 47

48

MR. PADGETT: I'm going to oppose based on the previous justifications provided by the Fish and

```
Page 87
     Wildlife Service.
 2
 3
                     Thank you.
4
 5
                     MR. DOOLITTLE: Thank you, Chad.
 6
 7
                     U.S. Fish and Wildlife Service, Greg
 8
     Siekaniec.
9
10
                     MR. SIEKANIEC: Thank you, Tom.
11
     oppose based on the justification I provided. Thank
12
     you.
13
14
                     MR. DOOLITTLE: Double checking to see
15
     if Public Member Charlie Brower is available.
16
17
                     (No response)
18
19
                     MR. DOOLITTLE: Hearing no answer from
20
     Mr. Brower.
21
2.2
                     The last vote is Chairman Anthony
23
    Christianson.
24
25
                     CHAIRMAN CHRISTIANSON:
                                             I support the
26
     Special Action Request in deference to the Regional
27
     Advisory Council and all the public participation
28
     today. Thank you.
29
30
                     MR. DOOLITTLE:
                                     Thank you, Chairman
31
     Christianson. The motion passes with the amendment.
32
     The next order of business, Mr. Chair, would be the
33
     adjournment of this meeting.
34
35
                     MR. SIEKANIEC: So moved.
36
37
                     MR. PELTOLA: Second.
38
39
                     MR. DOOLITTLE: One second.
40
     getting notified that we just lost some connections.
41
     Rhonda, you've been asked to be Vice Chair with making
     a motion to adjourn. We should probably take roll call
42
43
     on that just to be sure.
44
45
                     ACTING CHAIR PITKA: On a motion to
46
     adjourn? Hello?
47
48
                     MR. DOOLITTLE: Hi, Rhonda.
49
50
```

```
Page 88
                     ACTING CHAIR PITKA: Okay. I will take
2
     a roll call on the motion to adjourn then.
 3
4
                     MR. DOOLITTLE: Okay. Joshua Ream, to
 5
     adjourn.
 6
 7
                     MR. REAM: Support.
8
9
                     MR. DOOLITTLE: BLM, Chad Padgett.
10
11
                     MR. PADGETT: Support.
12
13
                     MR. DOOLITTLE: U.S. Fish and Wildlife
14
     Service, Greg Siekaniec.
15
16
                     MR. SIEKANIEC: I support. Thank you,
17
     Tom.
18
19
                     MR. DOOLITTLE: You bet, Greq.
20
21
                     U.S. Forest Service, Dave Schmid.
22
23
                     MR. SCHMID: I support adjournment and
24
     have a good weekend.
25
26
                     MR. DOOLITTLE: You too, Dave.
27
28
                     Bureau of Indian Affairs, Gene Peltola.
29
30
                     MR. PELTOLA: Support. Stay healthy
31
     and safe all.
32
33
                     MR. DOOLITTLE: Thanks, Gene.
34
35
                     Rhonda Pitka.
36
37
                     ACTING CHAIR PITKA: Support and have a
38
     good weekend everybody.
39
40
                     MR. DOOLITTLE: Sounds good. Is Tony
41
     Christianson back on.
42
43
                     (No response)
44
                     MR. DOOLITTLE: With Tony not on we
45
     still have a quorum to adjourn. Thank you very much
46
47
     Board members and all the people out there. Goodbye.
48
49
                       (END OF PROCEEDINGS)
50
```

```
CERTIFICATE
 1
 2
 3
    UNITED STATES OF AMERICA
 4
                                     )ss.
 5
     STATE OF ALASKA
 6
 7
             I, Salena A. Hile, Notary Public in and for the
 8
     state of Alaska and reporter for Computer Matrix Court
 9
     Reporters, LLC, do hereby certify:
10
11
             THAT the foregoing pages numbered through
         contain a full, true and correct Transcript of the
12
     FEDERAL SUBSISTENCE BOARD taken electronically on the
13
14
     1st day of May;
15
16
                     THAT the transcript is a true and
     correct transcript requested to be transcribed and
17
18
     thereafter transcribed by under my direction and
19
     reduced to print to the best of our knowledge and
20
     ability;
21
22
                     THAT I am not an employee, attorney, or
23
     party interested in any way in this action.
24
2.5
                     DATED at Anchorage, Alaska, this 31st
26
     day of May 2020.
27
28
29
30
                             Salena A. Hile
31
                             Notary Public, State of Alaska
32
                             My Commission Expires: 09/16/22
33
34
35
36
37
38
39
40
41
42
43
44
45
46
47
48
49
50
```

Phone: 907-243-0668