From: Joe Heublein - NOAA Federal <joe.heublein@noaa.gov>

**Sent:** Friday, May 24, 2019 9:41 AM **To:** Rosalie del Rosario - NOAA Federal

**Cc:** Garwin Yip - NOAA Federal; Howard Brown; Cathy Marcinkevage; Brian Ellrott **Subject:** Re: ROC on LTO draft BiOp revised I&S sections for QA/QC review/clearance

Hi Rosalie,

From what I've heard thus far changes to the effects sections are not going cause any significant changes to the I&S sections beyond the stressor tables. There may be revisions to the I&S sections after we receive BOR comments on Tuesday, so that could be a good time to plug in. I'm not sure what review sequence will leave enough time for your clearance review prior to peer review.

-Joe

On Fri, May 24, 2019 at 9:18 AM Rosalie del Rosario - NOAA Federal < rosalie.delrosario@noaa.gov > wrote: Hi Again,

I understand from Howard that folks are still revising various effects sections to address comments, which means the I&S sections may be undergoing another set of revisions. Howard and I agree that I should wait to receive the updated I&S sections that reflect the updated effects sections. So I'll hold off on reviewing I&S until the next round.

Thanks.

Rosalie

On Fri, May 24, 2019 at 6:59 AM Rosalie del Rosario - NOAA Federal < rosalie.delrosario@noaa.gov > wrote: Thanks Garwin. Can you please send winter run I&S because it looks like there are instead two versions of spring-run I&S attached.

Secondly, I will assume each version incorporates changes/updates to the effects sections to date (i.e., comments from BOR, etc), right?

Will get started on my reviews now.

Rosalie

On Fri, May 24, 2019 at 1:55 AM Garwin Yip - NOAA Federal <<u>garwin.yip@noaa.gov</u>> wrote: Rosalie,

Per your request, attached are the revised WR, SR, steelhead, and green sturgeon I&S sections for your review and clearance.

The track changes are a bit...colorful, but then you can see the changes, and how we addressed your comments.

-Garwin-

Garwin Yip

Water Operations and Delta Consultations Branch Chief

NOAA Fisheries West Coast Region

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On Fri, May 10, 2019 at 3:45 PM Rosalie del Rosario - NOAA Federal <<u>rosalie.delrosario@noaa.gov</u>> wrote:

Hi Garwin and Team,

Some comments on the I&S sections for winter run, spring run, steelhead, and sturgeon. I'd like to take a quick look at the revisions before they go for peer review.

Thanks, Rosalie

On Mon, May 6, 2019 at 11:43 PM Garwin Yip - NOAA Federal < garwin.yip@noaa.gov > wrote: All.

Attached are clean versions of the yellow-highlighted sections.

## 1 Introduction:

- **1.1 Background** [Garwin (C) drafted; Barb reviewed
- **1.2 COA** [Garwin (C) drafted; Barb reviewed]
- **1.3 Key consultation considerations** [Garwin (C) drafted; Barb, Cathy, Howard reviewed)
- **1.4 Consultation history** [Brittany drafted based on initiation memo; Garwin reviewed)
- **1.5 Proposed Federal Action** [Evan drafted; Howard, Amanda, Barb, Naseem, Garwin (C) reviewed]
- **2.1 Analytical approach** [Evan and Cathy drafted; Howard, Naseem (C), Rosalie (C), Chris (C), Maria, Garwin (C) reviewed]
- **2.2 Status of the species and CH** [Brittany and Page drafted; Barb, Amanda, Chris (C), Naseem, Garwin reviewed (C)]
- **2.3 Action Area** [Evan drafted; Barb, Naseem (C), Rosalie (C), Garwin (C) reviewed]
- **2.4 Environmental Baseline** [Brian drafted; Page, Naseem (C), Brian, Rosalie, Chris, Garwin (C) reviewed]
- 2.5 & 2.6 Effects of the Action on species and CH

**Stressor introductions** [Evan, Stephen, Kate drafted]

**American River Division** [Brian drafted; Brittany revised, Garwin reviewed x 2]

**Clear Creek** [Sarah drafted; Brittany revised, Garwin reviewed x 3]

**Shasta Division** [Evan drafted; Cathy revised x 3, Garwin reviewed x 3, Maria & Rosalie reviewed]

**East Side Division** [Barb drafted; Kristin revised, Garwin reviewed x 2]

**Delta Division** [Jeff drafted; Barb revised, Maria reviewed, Garwin reviewed x 2]

**SRKW** [Dan drafted; Jeff and Barb reviewed]

Chinook salmon analysis [John Hannon drafted; Dan, Jeff, Barb reviewed

**Climate change** [Cathy drafted; Garwin reviewed]

**Benefits of ongoing restoration to include in multiple sections** [Naseem drafted; Garwin (C) reviewed]

- **2.5.9** Life cycle model results [Cathy drafted; Evan revised]
- **2.7 Cumulative effects** [Brittany drafted, Garwin (C) reviewed]
- 2.8: Integration and Synthesis

Winter-run Chinook salmon [Brian drafted; Howard, Cathy, Naseem, Evan, Rosalie reviewed] CV spring-run Chinook salmon [Brian drafted; Barb, Cathy, Kristin, Naseem, Evan reviewed] CCV steelhead [Joe drafted; Barb, Sarah, Jeff, Rosalie, Garwin reviewed] sDPS green sturgeon [Joe drafted; Rosalie, Garwin reviewed]

## -Garwin-

Garwin Yip

Water Operations and Delta Consultations Branch Chief

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