

EPA-3054

Carol Holmes/DC/USEPA/US  
12/06/2009 01:25 PM

To Ben DeAngelo  
cc Dina Kruger, John Hannon, Lesley Jantarasami, Marcus Sarofim, Rona Birnbaum, Suzanne Kocchi, William Perkins  
bcc  
Subject Re: revised vol 9: endangerment

Two key things I added

PP 6-7 -- some text re [REDACTED] (b)(5) Deliberative

PP 30-31 -- added in a comment re [REDACTED] (b)(5) Deliberative

Also, I presume [REDACTED] (b)(5) Deliberative

Finally, the comment on p26 re [REDACTED] (b)(5) Deliberative

THANKS

[REDACTED] (b)(5) Deliberative

RTC draft Volume 9 120509 BJD jh1206 csh.doc

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Washington, DC 20460  
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Fax (202) 564-5603

Ben DeAngelo Thanks John. I've gone through and ac... 12/06/2009 12:45:35 PM

From: Ben DeAngelo/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA  
Cc: Carol Holmes/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 12:45 PM  
Subject: Re: revised vol 9: endangerment

Thanks John.

I've gone through and accepted comments and cleaned everything up. Will send you a couple editorial clarifications in a separate email.

EPA-EF-005194

Sorted out which parts of forestry comments go to vol 6 with Lesley.

Will wait for any additional comments.

-Ben

John Hannon      [Here are my edits to 9, see responses t...](#)      12/06/2009 10:42:51 AM

---

From:            John Hannon/DC/USEPA/US  
To:                Ben DeAngelo/DC/USEPA/US@EPA  
Cc:                Carol Holmes/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date:             12/06/2009 10:42 AM  
Subject:          Re: revised vol 9: endangerment

---

Here are my edits to 9, see responses to your points below.

[attachment "RTC draft Volume 9 120509 BJD -jh1206.doc" deleted by Carol Holmes/DC/USEPA/US]

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Fax (202) 564-5603

Ben DeAngelo      [I kept noteworthy or new text in track c...](#)      12/05/2009 04:05:31 PM

---

From:            Ben DeAngelo/DC/USEPA/US  
To:                Dina Kruger/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Cc:                William Perkins/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA  
Date:             12/05/2009 04:05 PM  
Subject:          revised vol 9: endangerment

---

I kept noteworthy or new text in track changes. A few issues to focus review below:

[attachment "RTC draft Volume 9 120509 BJD.doc" deleted by John Hannon/DC/USEPA/US]

\*\* Table of contents #'s need to change to 9.X

\*\* JOHN: your comment bottom p.6 -- addressed? [Yes](#).

\*\* JOHN/CAROL: middle p.7 --- check reference. [Fixed](#).

\*\* LESLEY: pp. 9/10 --- part of this comment/response can probably be moved to vol 6 --- ok?

\*\* FOR ERG (?): top of p. 20 --- (b)(5) Deliberative

\*\* JOHN/CAROL: top p. 25 --- check highlighted text [see attached](#).

\*\* DINA ET AL: bottom p. 26 ---- new response to (b)(5) Deliberative

-Ben

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deangelo.ben@epa.gov

EPA-3055

**Marcus  
Sarofim/DC/USEPA/US**  
12/06/2009 01:38 PM


To Jason Samenow  
cc  
bcc  
Subject volume 2 references

(b)(5) Deliberative



I added comment bubbles flagging all the above for ERG.

(b)(5) Deliberative



vol 2 refs second-round edited-mcs.doc

-Marcus

Marcus C. Sarofim, PhD  
phone: 202-343-9993  
fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

EPA-EF-005197

EPA-3056

**Lesley**  
**Jantarasami/DC/USEPA/US**  
12/06/2009 01:43 PM

To Carol Holmes  
cc Ben DeAngelo, Dina Kruger, Jason Samenow, John Hannon,  
Rona Birnbaum  
bcc  
Subject Re: I think I have reviewed what you've sent me at this point

Sure, I will work with Ben on getting those into vol 11.

Carol Holmes I've reviewed 1 (yesterday), 9 (today), 1... 12/06/2009 01:40:39 PM

From: Carol Holmes/DC/USEPA/US  
To: Rona Birnbaum/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US  
Date: 12/06/2009 01:40 PM  
Subject: I think I have reviewed what you've sent me at this point

I've reviewed 1 (yesterday), 9 (today), 10 (today), 11 (yesterday), and misc from Dina. Did I miss anything?

I think the only question is how to move some of the comments from 10 -11. Lesley, are you going to do that? I have to run errands for a few hours, but will be on cell ( (b)(6) ) and back this evening.

THANKS

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---

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---

EPA-EF-005198

EPA-3057

**Ben DeAngelo/DC/USEPA/US**

To William Perkins

12/06/2009 01:49 PM

cc

bcc

Subject CAIT referencde for vol 10

WRI (2009) *Climate Analysis Indicators Tool (CAIT) Version 6.0* . Available at <http://cait.wri.org/>. Accessed August 5, 2009.

EPA-EF-005199

EPA-3058

**Ben DeAngelo**

04/06/2010 04:56 PM

To

cc

bcc

Subject UPGOAD C:\Documents and Settings\owner\My Documents\Endangerment\Response to Public Comments\RTC draft Volume 10 Cause or Contribute 120509 BJD CSH 12 6.doc

(b)(5) Deliberative

- RTC draft Volume 10 Cause or Contribute 120509 BJD CSH 12 6.doc

EPA-EF-005200

EPA-3059

John Hannon/DC/USEPA/US  
12/06/2009 01:51 PM

To Carol Holmes  
cc Ben DeAngelo, Dina Kruger, Lesley Jantarasami, Rona Birnbaum, William Perkins  
bcc  
Subject Re: vol 10 -- cause & contribute -- still (minor) missing pieces

Just a few minor edits.

(b)(5) Deliberative

RTC draft Volume 10 Cause or Contribute 120509 BJD CSH 12 6 -jh1206.doc

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Fax (202) 564-5603

Carol Holmes Here are my comments on V10. Althou... 12/06/2009 11:36:29 AM

From: Carol Holmes/DC/USEPA/US  
To: Ben DeAngelo/DC/USEPA/US@EPA  
Cc: Dina Kruger/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 11:36 AM  
Subject: Re: vol 10 -- cause & contribute -- still (minor) missing pieces

Here are my comments on V10. Although John was going to take pen next, I still don't understand where we are (b)(5) Deliberative

We need to move comments (b)(5) Deliberative

THANKS

[attachment "RTC draft Volume 10 Cause or Contribute 120509 BJD CSH 12 6.doc" deleted by John Hannon/DC/USEPA/US]

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EPA-EF-005201



Ben DeAngelo Am about to head out of the office but... 12/05/2009 07:14:47 PM

From: Ben DeAngelo/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
Cc: Lesley Jantarasami/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/05/2009 07:14 PM  
Subject: vol 10 -- cause & contribute -- still (minor) missing pieces

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\*\* 10-15: (b)(5) Deliberative There's now an expanded response and sent to Bill I. for further feedback.

\*\* I need to get back to last two comments (10-19 and new N2O comment). There are comment bubbles there to check original comment for further clarification. I may have to check that tomorrow morning.

[attachment "RTC draft Volume 10 Cause or Contribute 120509 BJD.doc" deleted by Carol Holmes/DC/USEPA/US]

EPA-3060

Ben DeAngelo/DC/USEPA/US

To John Hannon

12/06/2009 01:57 PM

cc

bcc

Subject Re: revised vol 9: endangerment

John, couple things to clarify:

p. 27: [REDACTED] (b)(5) Deliberative

**Comment:**

[REDACTED] (b)(5) Deliberative

middle, p. 32: [REDACTED] (b)(5) Deliberative

**Response:**

[REDACTED] (b)(5) Deliberative

John Hannon

Here are my edits to 9, see responses t...

12/06/2009 10:42:51 AM

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To: Ben DeAngelo/DC/USEPA/US@EPA  
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Date: 12/06/2009 10:42 AM  
Subject: Re: revised vol 9: endangerment

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[attachment "RTC draft Volume 9 120509 BJD -jh1206.doc" deleted by Ben DeAngelo/DC/USEPA/US]

EPA-EF-005203

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Ben DeAngelo | I kept noteworthy or new text in track c... 12/05/2009 04:05:31 PM

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Date: 12/05/2009 04:05 PM  
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[attachment "RTC draft Volume 9 120509 BJD.doc" deleted by John Hannon/DC/USEPA/US]

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\*\* JOHN/CAROL: top p. 25 --- check highlighted text [see attached](#).

\*\* DINA ET AL: bottom p. 26 ---- new response to (b)(5) Deliberative

-Ben

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EPA-EF-005204

EPA-3061

**Jason**  
**Samenow/DC/USEPA/US**  
12/06/2009 02:08 PM

To Lesley Jantarasami  
cc Ben DeAngelo  
bcc

Subject wildfire, temp and snowmelt response

I reworked it, and it should be good to go after you proofread it. Please be sure to note the reference I added in the back of the volume.

Jason

(b)(5) Deliberative

Drought and Fire comment.doc

EPA-EF-005205

EPA-3062

**Carol Holmes/DC/USEPA/US**

12/06/2009 02:08 PM

To John Hannon

cc Ben DeAngelo, Dina Kruger, Lesley Jantarasami, Rona Birnbaum, William Perkins

bcc

Subject Re: vol 10 -- cause & contribute -- still (minor) missing pieces

I am good with all of John's edits (per usual!).

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 Fax (202) 564-5603

---

|             |                                     |                        |
|-------------|-------------------------------------|------------------------|
| John Hannon | Just a few minor edits. John Hannon | 12/06/2009 01:51:19 PM |
|-------------|-------------------------------------|------------------------|

From: John Hannon/DC/USEPA/US  
 To: Carol Holmes/DC/USEPA/US@EPA  
 Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
 Date: 12/06/2009 01:51 PM  
 Subject: Re: vol 10 -- cause & contribute -- still (minor) missing pieces

---

Just a few minor edits.

[attachment "RTC draft Volume 10 Cause or Contribute 120509 BJD CSH 12 6 -jh1206.doc" deleted by Carol Holmes/DC/USEPA/US]

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|              |  |                        |
|--------------|--|------------------------|
| Carol Holmes | Here are my comments on V10. Althou... | 12/06/2009 11:36:29 AM |
|--------------|--|------------------------|

From: Carol Holmes/DC/USEPA/US  
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 Date: 12/06/2009 11:36 AM  
 Subject: Re: vol 10 -- cause & contribute -- still (minor) missing pieces

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EPA-EF-005206

we are (b)(5) Deliberative

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THANKS

[attachment "RTC draft Volume 10 Cause or Contribute 120509 BJD CSH 12 6.doc" deleted by John Hannon/DC/USEPA/US]

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Ben DeAngelo Am about to head out of the office but... 12/05/2009 07:14:47 PM

From: Ben DeAngelo/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
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[attachment "RTC draft Volume 10 Cause or Contribute 120509 BJD.doc" deleted by Carol Holmes/DC/USEPA/US]

EPA-3064

Dina Kruger/DC/USEPA/US

12/06/2009 02:09 PM

To John Hannon

cc Ben DeAngelo, Carol Holmes, Rona Birnbaum

bcc

Subject Re: My last two comments on Vol 11.

OK - I took your changes, and deleted the irrelevant comment bubbles. No need to do anything further with this one. Left the big bubble on (b)(5) Deliberative but only so Carol knows I accepted her change, with John's addition.

My reordering/rewording of the (b)(5) Deliberative

(b)(5) Deliberative

Vol 11 - last two comments + NEAR FINAL.doc

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

John Hannon

A few tweaks to (b)(5) Deliberative

12/06/2009 01:22:59 PM

From: John Hannon/DC/USEPA/US  
To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 01:22 PM  
Subject: Re: My last two comments on Vol 11.

A few tweaks to (b)(5) Deliberative

[attachment "Vol 11 - last two comments CSH -jh1206.doc" deleted by Dina Kruger/DC/USEPA/US]

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Carol Holmes

I had some comments. (b)(5) Deliberative

12/06/2009 12:28:19 PM

From: Carol Holmes/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA

EPA-EF-005208

Cc: Ben DeAngelo/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 12:28 PM  
Subject: Re: My last two comments on Vol 11.

---

I had some comments.

[REDACTED] (b)(5) Deliberative

[REDACTED] Let me know what you think.

[attachment "Vol 11 - last two comments CSH.doc" deleted by Dina Kruger/DC/USEPA/US]

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Fax (202) 564-5603

---

Dina Kruger

[REDACTED] (b)(5) Deliberative

12/06/2009 12:01:55 PM

From: Dina Kruger/DC/USEPA/US  
To: carol holmes, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA  
Date: 12/06/2009 12:01 PM  
Subject: My last two comments on Vol 11.

---

[REDACTED] (b)(5) Deliberative

The only other question I have on volume 11 is [REDACTED] (b)(5) Deliberative

Thanks all --

[attachment "Vol 11 - last two comments.doc" deleted by Carol Holmes/DC/USEPA/US]

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Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)



EPA-3065

Jeremy  
Martinich/DC/USEPA/US  
12/06/2009 02:12 PM

To Jason Samenow  
cc  
bcc

Subject USE THESE: Revised IQA comments for Vol. 2

Comment:

(b)(5) Deliberative

Response:

(b)(5) Deliberative

[Redacted]

Comment:

(b)(5) Deliberative

[Redacted]

Response:

(b)(5) Deliberative

(b)(5) Deliberative

\*\*\*\*\*

Jeremy Martinich  
USEPA, Climate Change Division  
202-343-9871

Jeremy Martinich

\*\*\*\*\* Jeremy Martinich

12/05/2009 01:32:35 PM

From: Jeremy Martinich/DC/USEPA/US  
To: Jason Samenow/DC/USEPA/US@EPA  
Date: 12/05/2009 01:32 PM  
Subject: Revised IQA comments for Vol. 2

---

[attachment "IQAs in others.doc" deleted by Jeremy Martinich/DC/USEPA/US]

\*\*\*\*\*

Jeremy Martinich  
USEPA, Climate Change Division  
202-343-9871

EPA-3066

Rona  
Birnbaum/DC/USEPA/US  
12/06/2009 02:14 PM

To Dina Kruger, Jeremy Martinich, Lesley Jantarasami  
cc Ben DeAngelo, Carol Holmes, John Hannon  
bcc

Subject Re: My last two comments on Vol 11.

Ok. important that [REDACTED] (b)(5) Deliberative  
[REDACTED] Including Jeremy (for V 1 and Lesley for V 11) on this now that we have agreement on text.

Dina Kruger OK - I took your changes, and deleted t... 12/06/2009 02:09:48 PM

From: Dina Kruger/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 02:09 PM  
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My reordering/rewording [REDACTED] (b)(5) Deliberative  
[REDACTED]

[attachment "Vol 11 - last two comments + NEAR FINAL.doc" deleted by Rona Birnbaum/DC/USEPA/US]

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

John Hannon A few tweaks (b)(5) Deliberative 12/06/2009 01:22:59 PM

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To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 01:22 PM  
Subject: Re: My last two comments on Vol 11.

A few tweaks [REDACTED] (b)(5) Deliberative  
[REDACTED]

[attachment "Vol 11 - last two comments CSH -jh1206.doc" deleted by Dina Kruger/DC/USEPA/US]

EPA-EF-005212

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Dina Kruger | (b)(5) Deliberative | 12/06/2009 12:01:55 PM

From: Dina Kruger/DC/USEPA/US  
To: carol holmes, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA  
Date: 12/06/2009 12:01 PM  
Subject: My last two comments on Vol 11.

(b)(5) Deliberative

The only other question I have on volume 11 is (b)(5) Deliberative

Thanks all --

[attachment "Vol 11 - last two comments.doc" deleted by Carol Holmes/DC/USEPA/US]

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

EPA-3067

Rona  
Birnbaum/DC/USEPA/US  
12/06/2009 02:14 PM

To Dina Kruger  
cc  
bcc

Subject Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

great. I'll Jeremy and Lesley' know you'll be sending the clean version.

Rona Birnbaum  
Chief, Climate Science and Impacts Branch  
USEPA, Climate Change Division  
birnbaum.rona@epa.gov  
202-343-9076

Dina Kruger I like this. I'm putting it in and giving it t... 12/06/2009 02:12:13 PM

From: Dina Kruger/DC/USEPA/US  
To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 02:12 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

I like this. I'm putting it in and giving it to Lesley along with the other 2 we've been working on in Vol 11. So we can finish that one up.

Dina Kruger  
Director, Climate Change Division  
USEPA

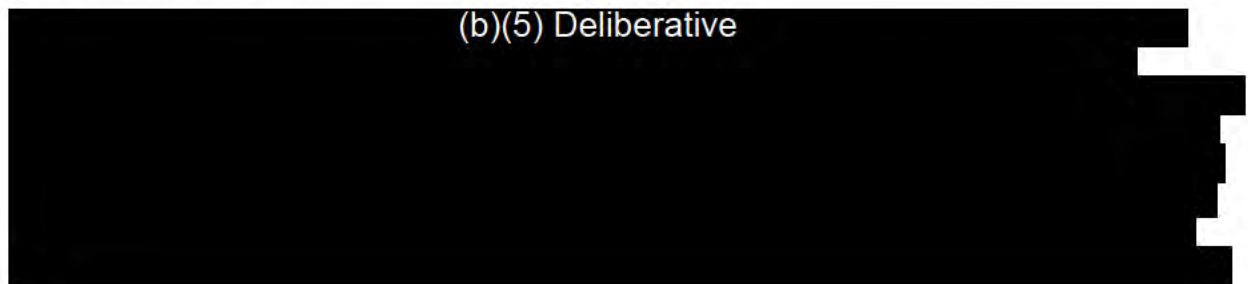
202-343-9039 (phone)  
202-343-2290 (fax)

Carol Holmes How about something like: (b)(5) Deliberative 12/06/2009 12:36:34 PM

From: Carol Holmes/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 12:36 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

How about something like:

(b)(5) Deliberative



(b)(5) Deliberative

Confidential communication for internal deliberations only; Attorney-client, attorney work product and/or enforcement privilege; Do not distribute outside EPA or DOJ

---

Carol S. Holmes  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave, NW (MC 2344A)  
Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

---

Dina Kruger      I agree with your first two bubbles and...      12/06/2009 12:19:09 PM

From: Dina Kruger/DC/USEPA/US  
To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 12:19 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

---

I agree with your first two bubbles and have revised. Regarding the last paragraph, (b)(5) Deliberative

open to advice on how to handle -

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

Carol Holmes      I had a few small edits. Also, not sure if...      12/06/2009 12:13:37 PM

From: Carol Holmes/DC/USEPA/US  
To: Rona Birnbaum/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
Date: 12/06/2009 12:13 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

---

I had a few small edits. Also, not sure (b)(5) Deliberative

[attachment "Comment#2 - Vol 11+DINA+csh.doc" deleted by Dina Kruger/DC/USEPA/US]

Confidential communication for internal deliberations only; Attorney-client, attorney work product and/or enforcement privilege; Do not distribute outside EPA or DOJ

Carol S. Holmes  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave, NW (MC 2344A)  
Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

---

Rona Birnbaum | looks really good. Wonder if you want t... | 12/06/2009 11:50:24 AM

From: Rona Birnbaum/DC/USEPA/US  
To: Jason Samenow/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
Date: 12/06/2009 11:50 AM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

looks really good. Wonder if you want to [REDACTED] (b)(5) Deliberative

---

Jason Samenow | looks good to me. jason | 12/06/2009 11:35:36 AM

From: Jason Samenow/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 11:35 AM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

looks good to me.

jason

---

Dina Kruger | Sorry - this should be the right commen... | 12/06/2009 11:29:52 AM

From: Dina Kruger/DC/USEPA/US  
To: Rona Birnbaum/DC/USEPA/US@EPA  
Cc: carol holmes, Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
Date: 12/06/2009 11:29 AM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

Sorry - this should be the right comment. On Volume 11, I have only two other issues that I will send shortly. (1) [REDACTED] (b)(5) Deliberative

[REDACTED] (2) [REDACTED] (b)(5) Deliberative I'll plan to send both of those soon in a similar form to the one below. (Jason, you only need look at this one and just to be sure I haven't made a factual error.)

[attachment "Comment#2 - Vol 11+DINA.doc" deleted by Jason Samenow/DC/USEPA/US]

Dina Kruger  
Director, Climate Change Division  
USEPA

EPA-EF-005217



202-343-9039 (phone)  
202-343-2290 (fax)

Rona Birnbaum you sent the wrong comment/response... 12/06/2009 11:22:58 AM

From: Rona Birnbaum/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA  
Date: 12/06/2009 11:22 AM  
Subject: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

---

you sent the wrong comment/response - -this is Vol 1.

Dina Kruger OK - I revised it (b)(5) Deliberative 12/06/2009 11:17:49 AM

From: Dina Kruger/DC/USEPA/US  
To: carol holmes, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA  
Date: 12/06/2009 11:17 AM  
Subject: Comment #2 in Vol 11 -- late comments/hacked e-mails

---

OK - I revised it (b)(5) Deliberative  
Revisions welcome -

[attachment "Comment 1.1 + Dina [2].doc" deleted by Rona Birnbaum/DC/USEPA/US]

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

EPA-3068

**Lesley**  
**Jantarasami/DC/USEPA/US**  
12/06/2009 02:21 PM

To Dina Kruger  
cc Rona Birnbaum  
bcc  
Subject additional forestry coment

Dina,

Here is a separate file with that one additional forestry comment in it, if you'd prefer to do track changes on it.

(b)(5) Deliberative

Additional Vol 6 Drought and Fire comment.doc

Thanks,

Lesley

Lesley Jantarasami  
US EPA, Climate Change Division  
Climate Science & Impacts Branch  
202.343.9929  
202.343.2202 (fax)  
Jantarasami.Lesley@epa.gov

EPA-3069

William  
Perkins/DC/USEPA/US  
12/06/2009 02:24 PM

To Matthew Mitchell, Sue Eisenfeld  
cc Mae Thomas  
bcc Lesley Jantarasami  
Subject Fw: ERG additional insert for Vol 6 - forestry

Matt and Sue,

See below; thank you.

Cheers,

Bill

Bill Perkins  
Climate Change Adaptation Analyst  
Climate Science and Impacts Branch  
Climate Change Division  
U.S. Environmental Protection Agency  
perkins.william@epa.gov  
(O) 202.343.9460  
(F) 202.343.2202  
(C) (b)(6)

----- Forwarded by William Perkins/DC/USEPA/US on 12/06/2009 02:23 PM -----

From: Lesley Jantarasami/DC/USEPA/US  
To: William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 02:16 PM  
Subject: ERG additional insert for Vol 6 - forestry

Please insert this new comment/response to replace the entire comment/response on page 35 with the paragraph that states:

(b)(5) Deliberative

(b)(5) Deliberative

Drought and Fire comment.doc

It should be inserted directly after this comment/response:


**Comment:**

(b)(5) Deliberative

**Response:**

(b)(5) Deliberative

(b)(5) Deliberative



EPA-3070

**Ben DeAngelo/DC/USEPA/US**

12/06/2009 02:32 PM

To Lesley Jantarasami

cc Jason Samenow

bcc

Subject Re: drought and wildfire comment

Couldn't get to this earlier but only have a couple tweaks, particularly with the very last sentence -- not a big if Dina's not seeing this change when she reviews.

(b)(5) Deliberative

Drought and Fire comment BJD.doc

Lesley Jantarasami

Hi guys - if I could get your assistan...

12/06/2009 11:06:42 AM

From: Lesley Jantarasami/DC/USEPA/US  
To: Jason Samenow/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US  
Date: 12/06/2009 11:06 AM  
Subject: drought and wildfire comment

---

Hi guys - if I could get your assistance on this comment in the next half hour or so, we may be able to get this over to Dina before she reviews the rest of Vol 6 (Forestry).

[attachment "Drought and Fire comment.doc" deleted by Ben DeAngelo/DC/USEPA/US]

Thanks!!

Lesley

EPA-EF-005222

EPA-3071

**Marcus Sarofim**

To

cc

bcc

Subject UPGRADE C:\Documents and Settings\msarofim\My Documents\WorkFolder\Tsd\_Anpr\ResponseToComments\Final\Volumes\vol 2 refs second-round edited-mcs.doc

(b)(5) Deliberative

- vol 2 refs second-round edited-mcs.doc

EPA-EF-005223

EPA-3072

**William  
Perkins/DC/USEPA/US**  
12/06/2009 02:40 PM

To Rona Birnbaum, Carol Holmes, John Hannon, Ben  
DeAngelo, David Chalmers, Lesley Jantarasami, Marcus  
Sarofim, Jeremy Martinich, Jason Samenow, Michael Kolian  
cc

bcc

Subject Fyi: Commenter Submitted/Incorporated References List

All,

Enclosed is the list of all materials that commenters submitted or incorporated by reference . There are about **(b)(5) Deliberative** This will be docketed, is referred to in the forewords and Volume 1, and some of you refer to this in your RTC volumes. Thank you.

Cheers,

Bill



Materials Submitted or Referred to in Public Comments EPA-HQ-OAR-2009-0171.pdf

available at  
[regulations.gov](http://regulations.gov)

Bill Perkins  
Climate Change Adaptation Analyst  
Climate Science and Impacts Branch  
Climate Change Division  
U.S. Environmental Protection Agency  
perkins.william@epa.gov  
(O) 202.343.9460  
(F) 202.343.2202  
(C) **(b)(6)**

EPA-EF-005224

EPA-3073

**Lesley**  
**Jantarasami/DC/USEPA/US**  
12/06/2009 02:41 PM

To Ben DeAngelo  
cc  
bcc  
Subject vol 11

(b)(5) Deliberative

RTC draft Volume New 11 12-05-09 to ERG.doc

EPA-EF-005225



EPA-3074

John Hannon/DC/USEPA/US

12/06/2009 02:45 PM

To Jason Samenow

cc Rona Birnbaum

bcc

Subject Re: Status of RTC Volumes

Jason, just a few edits.

(b)(5) Deliberative

vol 5 120609 -jh1206.doc

John Hannon  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave. NW (MC 2344A)  
Washington, D.C. 20460  
Phone (202) 564-5563  
Fax (202) 564-5603

Jason Samenow

John-- Here is the latest Vol 5... I hav...

12/06/2009 11:57:52 AM

From: Jason Samenow/DC/USEPA/US  
To: Rona Birnbaum/DC/USEPA/US@EPA  
Cc: John Hannon/DC/USEPA/US@EPA  
Date: 12/06/2009 11:57 AM  
Subject: Re: Status of RTC Volumes

John-- Here is the latest Vol 5... I have not gone through it since the latest copy edit to remove comment bubbles, polish off references, and address a couple outstanding issues. I won't be able to do that until I get through a number of issues I'm working through on Vol 2. But please go ahead and review and flag anything you notice.

Thanks,  
Jason

[attachment "vol 5 120609.doc" deleted by John Hannon/DC/USEPA/US]

Rona Birnbaum

sounds good John. Dina gave Jeremy...

12/06/2009 11:11:09 AM

From: Rona Birnbaum/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, David Chalmers/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 11:11 AM  
Subject: Re: Status of RTC Volumes

EPA-EF-005226

sounds good John. Dina gave Jeremy just a few additional comments on 7 and he is working on that right now - - he'll send that to you with her comments incorporated.

Jason, please send John vol 5 with any tweaks you may have added.

Lesley is incorporating Dina's edits on Ag right now. She'll send your way as soon as those are in there.

Dina is reviewing Forestry this morning. would be best to pass to you the version that includes Dina's comments.

thanks!

|             |   |                        |
|-------------|---|------------------------|
| John Hannon | Rona, I want to take a final once over o... | 12/06/2009 10:47:05 AM |
|-------------|---|------------------------|

From: John Hannon/DC/USEPA/US  
 To: Rona Birnbaum/DC/USEPA/US@EPA  
 Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, David Chalmers/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
 Date: 12/06/2009 10:47 AM  
 Subject: Re: Status of RTC Volumes

Rona, I want to take a final once over on 5, 6, and 7 when they are ready. I'm not going over 2,3,4, or 8. I'm done with 9, just sent edits, and done with 11. I'm still going to go over 1 and 10, and will do that next but that should be quick.

John Hannon  
 Office of General Counsel  
 U.S. Environmental Protection Agency  
 1200 Pennsylvania Ave. NW (MC 2344A)  
 Washington, D.C. 20460  
 Phone (202) 564-5563  
 Fax (202) 564-5603

|               |  |                        |
|---------------|--|------------------------|
| Rona Birnbaum | ALL: status as of 5:15 pm. Vol 1: final d... | 12/05/2009 05:15:22 PM |
|---------------|--|------------------------|

From: Rona Birnbaum/DC/USEPA/US  
 To: Jason Samenow/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, David Chalmers/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA  
 Cc: Dina Kruger/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA  
 Date: 12/05/2009 05:15 PM  
 Subject: Status of RTC Volumes

ALL: status as of 5:15 pm.

Vol 1: final draft now with Dina, John, Carol. Went to ERG for final editing. Any final comments will be made directly onto the edited version in morning.

Vol 2: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version.

Vol 3: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version.

Vol 4: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version.

Vol 5: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version.

Vol 6: OGC review complete. Dina reviewing final Ag draft tonight. Final forestry draft will be sent tonight and final review tomorrow morning. Will also be sent OGC if John wants to have another look at that time. Will go to ERG tonight.

Vol 7: OGC review complete. Final draft with Dina and with ERG. Any final comments will be made directly onto the edited version in morning.

Vol 8: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version. (A few lingering specific comments being worked out.)

Vol 9: final draft now with Dina, Rona, John, Carol. Is with ERG for editing. Any final comments will be made directly onto the edited version in morning.

Vol 10: final draft will be sent to Dina, Rona, John, Carol at 6:00 tonight. Final draft will also be sent to ERG at 6:00. Final review will be completed in the morning and edits made directly onto the edited version.

Vol 11: final draft with Dina. A few responses expected to be update [REDACTED] OGC review complete but will review the updated responses. Already went to ERG and final edits will be made directly onto the edited version.

On all Volumes: Rona, Dina, Carol and John are ready to address any specific questions on comments/responses.

David: please update the checklist for docketing.

**ALL Volumes to be completed by 6:00 Sunday (many should be completed before then ). At that point, Bill will work with the Web people to upload all volumes onto the staging server . Once up, we all will still be able to continue with minor polishing , cross-checking, etc. We want to be completed by Monday morning, although minor things can still be tweaked , if needed, on Monday morning .**

**We're almost there!!**

EPA-3075

Marcus  
Sarofim/DC/USEPA/US  
12/06/2009 02:48 PM

To David Chalmers  
cc  
bcc  
Subject Edits for Volume 4:

Edits for Volume 4:

Comment 4-40: [redacted] (b)(5) Deliberative

Response 4-40: [redacted] (b)(5) Deliberative

Addition for Volume 4, 4.1, models (somewhere near the end?):

[redacted] (b)(5) Deliberative

models 9 to vol 4-mcs.doc

-Marcus

Marcus C. Sarofim, PhD  
phone: 202-343-9993  
fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

David Chalmers OK, thanks for the heads up. is it a wh... 12/06/2009 10:52:10 AM

From: David Chalmers/DC/USEPA/US  
To: Marcus Sarofim/DC/USEPA/US@EPA  
Date: 12/06/2009 10:52 AM  
Subject: Re: Volume 10 comment for combining together---please let me know ASAP

OK, thanks for the heads up. is it a whole new summary/response? If so, can please try to get to me by around 3? Think I should start the re-numbering/ X filling by then. thanks!

David Chalmers  
ORISE Fellow  
U.S. EPA, Climate Change Division  
202.343.9814

-----Marcus Sarofim/DC/USEPA/US wrote: -----

To: David Chalmers/DC/USEPA/US@EPA  
From: Marcus Sarofim/DC/USEPA/US  
Date: 12/06/2009 10:42AM  
Subject: Re: Volume 10 comment for combining together---please let me know ASAP

btw, I have a comment that will need to get inserted into volume 4, models section, coming from volume 9... I'll send that to you later, but wanted to give you a heads up.

-Marcus

EPA-EF-005229

Marcus C. Sarofim, PhD  
phone: 202-343-9993  
fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

David Chalmers---12/05/2009 11:28:20 PM---Thanks for flagging this Marcus. Ben/Lesley: Please let me know what you decide to do about this

From: David Chalmers/DC/USEPA/US  
To: Lesley Jantarasami/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA  
Cc: Marcus Sarofim/DC/USEPA/US@EPA  
Date: 12/05/2009 11:28 PM  
Subject: Re: Volume 10 comment for combining together---please let me know ASAP

Thanks for flagging this Marcus.

Ben/Lesley: Please let me know what you decide to do about this as soon as possible. I have numerous XXXs to fill in where we refer comments to other parts of the volume for specific issues but can't do that until the numbering is finalized, so please let me know by early afternoon if possible. Thanks.

-----Marcus Sarofim/DC/USEPA/US wrote: -----

To: Lesley Jantarasami/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA  
From: Marcus Sarofim/DC/USEPA/US  
Date: 12/05/2009 08:51PM  
cc: David Chalmers/DC/USEPA/US@EPA  
Subject: Volume 10 comment for combining together...

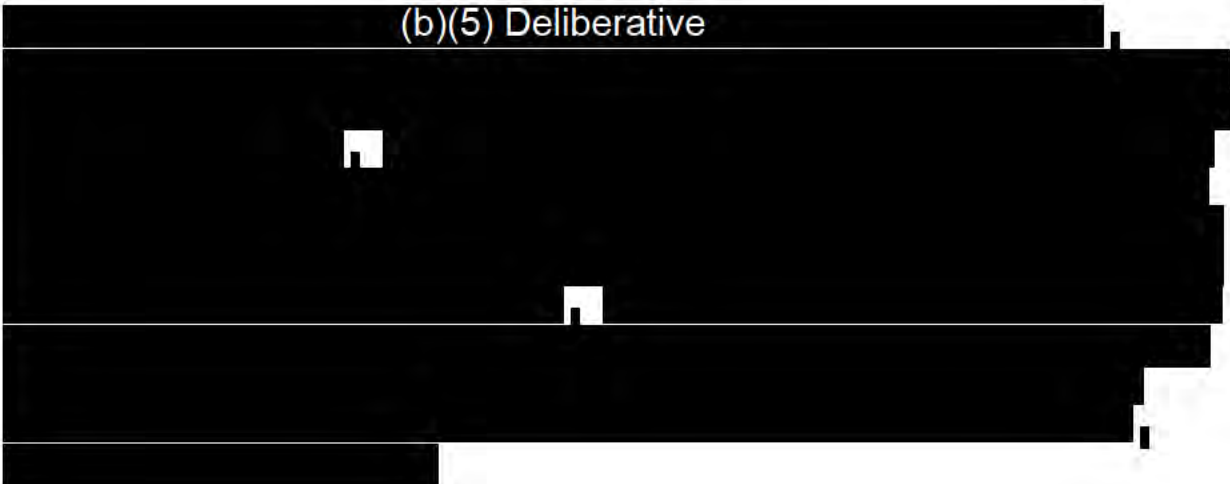
Found this in volume 4: Dina suggests combining with (almost) identical Volume 10 - Cause and Contribute - comment and putting in one place: personally, looking at the last version of volume 10 that I have, (b)(5) Deliberative

Email me back when you know where this goes. Sorry, David, this will mean renumbering for you, probably... though hold off on that until tomorrow morning, in case any more comments appear/disappear...

**Comment (4-45):**

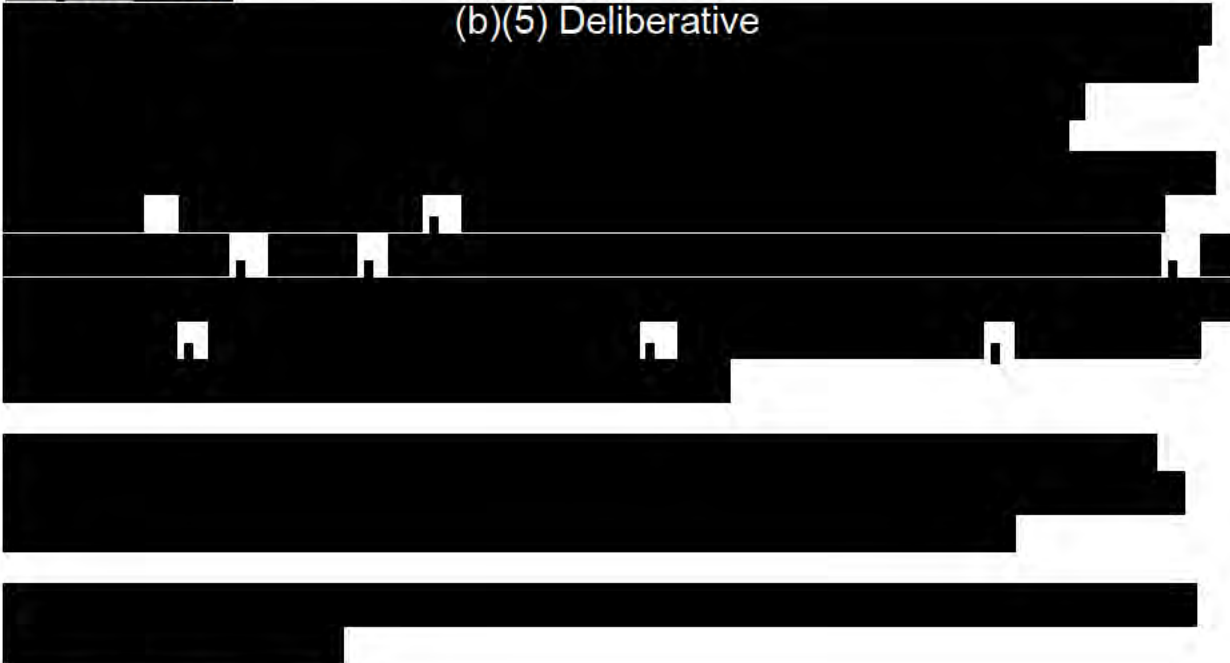
(b)(5) Deliberative

(b)(5) Deliberative



**Response (4-45):**

(b)(5) Deliberative



Marcus C. Sarofim, PhD  
phone: 202-343-9993  
fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

EPA-3076

Dina Kruger/DC/USEPA/US

12/06/2009 02:54 PM

To Rona Birnbaum

cc Lesley Jantarasami, Jeremy Martinich, carol holmes, John Hannon

bcc

Subject Vol 11 comments (3); Vol 1 (1)

All,

Here are the three comments from Vol 11 (b)(5) Deliberative Vol 1. I think I've fixed everything. There are a few comment bubbles in the 2nd file (b)(5) Deliberative. A couple have little things to be tracked down for consistency, and the last one is Carol and me having a virtual conversation. Lesley, you can delete that one (I just left it for Carol).

Thanks,

Dina

(b)(5) Deliberative

(b)(5) Deliberative

Comment#2 - Vol 11+FINAL.doc Vol 11 - last two comments + FINAL.doc

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

Rona Birnbaum great. I'll Jeremy and Lesley' know you'... 12/06/2009 02:14:54 PM

From: Rona Birnbaum/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA  
Date: 12/06/2009 02:14 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

great. I'll Jeremy and Lesley' know you'll be sending the clean version.

Rona Birnbaum  
Chief, Climate Science and Impacts Branch  
USEPA, Climate Change Division  
birnbaum.rona@epa.gov  
202-343-9076

Dina Kruger I like this. I'm putting it in and giving it t... 12/06/2009 02:12:13 PM

From: Dina Kruger/DC/USEPA/US  
To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 02:12 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

I like this. I'm putting it in and giving it to Lesley along with the other 2 we've been working on in Vol 11. So we can finish that one up.

EPA-EF-005232

Dina Kruger  
Director, Climate Change Division  
USEPA


202-343-9039 (phone)  
202-343-2290 (fax)

Carol Holmes      [How about something like:](#) (b)(5) Deliberative      12/06/2009 12:36:34 PM

From: Carol Holmes/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 12:36 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

How about something like:

(b)(5) Deliberative



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---

Carol S. Holmes  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave, NW (MC 2344A)  
Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

Dina Kruger      [I agree with your first two bubbles and...](#)      12/06/2009 12:19:09 PM

From: Dina Kruger/DC/USEPA/US  
To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 12:19 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

I agree with your first two bubbles and have revised. Regarding the last paragraph, (b)(5) Deliberative





(b)(5) Deliberative  
open to advice on how to handle -

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

Carol Holmes | I had a few small edits. Also, not sure if... | 12/06/2009 12:13:37 PM

From: Carol Holmes/DC/USEPA/US  
To: Rona Birnbaum/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
Date: 12/06/2009 12:13 PM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

I had a few small edits. Also, not sure (b)(5) Deliberative

[attachment "Comment#2 - Vol 11+DINA+csh.doc" deleted by Dina Kruger/DC/USEPA/US]

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Carol S. Holmes  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave, NW (MC 2344A)  
Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

Rona Birnbaum | looks really good. Wonder if you want t... | 12/06/2009 11:50:24 AM

From: Rona Birnbaum/DC/USEPA/US  
To: Jason Samenow/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
Date: 12/06/2009 11:50 AM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

looks really good. Wonder if you want to (b)(5) Deliberative

Jason Samenow | looks good to me. jason | 12/06/2009 11:35:36 AM

From: Jason Samenow/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, John

Date: Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
12/06/2009 11:35 AM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

looks good to me.

jason

Dina Kruger Sorry - this should be the right commen... 12/06/2009 11:29:52 AM

From: Dina Kruger/DC/USEPA/US  
To: Rona Birnbaum/DC/USEPA/US@EPA  
Cc: carol holmes, Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
Date: 12/06/2009 11:29 AM  
Subject: Re: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

Sorry - this should be the right comment. On Volume 11, I have only two other issues that I will send shortly. (1) [REDACTED] (b)(5) Deliberative

[REDACTED] (2) (b)(5) Deliberative I'll plan to send both of those soon in a similar form to the one below. (Jason, you only need look at this one and just to be sure I haven't made a factual error.)

[attachment "Comment#2 - Vol 11+DINA.doc" deleted by Jason Samenow/DC/USEPA/US]

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

Rona Birnbaum you sent the wrong comment/response... 12/06/2009 11:22:58 AM

From: Rona Birnbaum/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA  
Date: 12/06/2009 11:22 AM  
Subject: Need to resend Re: Comment #2 in Vol 11 -- late comments/hacked e-mails

you sent the wrong comment/response - -this is Vol 1.

Dina Kruger OK - I revised it [REDACTED] (b)(5) Deliberative 12/06/2009 11:17:49 AM

From: Dina Kruger/DC/USEPA/US  
To: carol holmes, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA  
Date: 12/06/2009 11:17 AM  
Subject: Comment #2 in Vol 11 -- late comments/hacked e-mails

OK - I revised it [REDACTED] (b)(5) Deliberative  
[REDACTED] Revisions welcome -

[attachment "Comment 1.1 + Dina [2].doc" deleted by Rona Birnbaum/DC/USEPA/US]

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

EPA-3077

William  
Perkins/DC/USEPA/US  
12/06/2009 03:05 PM

To Ben DeAngelo  
cc  
bcc  
Subject Fw: volume 10 back from ERG

Bill Perkins  
Climate Change Adaptation Analyst  
Climate Science and Impacts Branch  
Climate Change Division  
U.S. Environmental Protection Agency  
perkins.william@epa.gov  
(O) 202.343.9460  
(F) 202.343.2202  
(C) (b)(6)

----- Forwarded by William Perkins/DC/USEPA/US on 12/06/2009 03:05 PM -----

From: "Matthew Mitchell" <Matthew.Mitchell@erg.com>  
To: Lesley Jantarasami/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Cc: "Mae Thomas" <Mae.Thomas@erg.com>, "Sue Eisenfeld" <Sue.Eisenfeld@erg.com>  
Date: 12/06/2009 03:02 PM  
Subject: volume 10

Here's the second-round edit of Volume 10. Please let me know if you have any questions! Today, I'm still best reachable by cell phone: (b)(6).

Matthew N. Mitchell  
ERG  
110 Hartwell Avenue  
Lexington, MA 02421-3136  
(p) 781-674-7331  
(f) 7 51  
(b)(5) Deliberative

vol 10 second-round edited.doc

EPA-EF-005237

EPA-3078

**Rona**  
**Birnbaum/DC/USEPA/US**  
12/06/2009 03:16 PM

To Dina Kruger  
cc  
bcc  
Subject the list



Materials Submitted or Referred to in Public Comments EPA-HQ-OAR-2009-0171.pdf

available at  
[regulations.gov](http://www.regulations.gov)

EPA-EF-005238

EPA-3079

**Lesley Jantarasami**  
04/01/2010 03:51 PM

To  
cc  
bcc

Subject UPGOAD C:\Documents and Settings\ljantara\My Documents\Endangerment\02\_Comments and Responses\Vol 6 stuff\RTC draft Volume 6 Combined 12-05-09 to ERG.doc

(b)(5) Deliberative

- RTC draft Volume 6 Combined 12-05-09 to ERG.doc

EPA-EF-005239

EPA-3080

John Hannon/DC/USEPA/US  
12/06/2009 03:19 PM

To Lesley Jantarasami  
cc Rona Birnbaum  
bcc  
Subject Re: Status of RTC Volumes

I think it's just one comment, on page 13.

(b)(5) Deliberative

RTC draft Volume 6 Ag Only 12-06-09 -jh1206.doc

John Hannon  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave. NW (MC 2344A)  
Washington, D.C. 20460  
Phone (202) 564-5563  
Fax (202) 564-5603

Lesley Jantarasami John, here is the latest version of V... 12/06/2009 11:43:25 AM

From: Lesley Jantarasami/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA  
Cc: Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 11:43 AM  
Subject: Re: Status of RTC Volumes

John, here is the latest version of Vol 6 - Agriculture.

(b)(5) Deliberative

RTC draft Volume 6 Ag Only 12-06-09 .doc

Thanks,

Lesley

Rona Birnbaum sounds good John. Dina gave Jeremy... 12/06/2009 11:11:08 AM

From: Rona Birnbaum/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, David Chalmers/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 11:11 AM  
Subject: Re: Status of RTC Volumes

sounds good John. Dina gave Jeremy just a few additional comments on 7 and he is working on that right now -- he'll send that to you with her comments incorporated.

EPA-EF-005240

Jason, please send John vol 5 with any tweaks you may have added. Lesley is incorporating Dina's edits on Ag right now. She'll send your way as soon as those are in there. Dina is reviewing Forestry this morning. would be best to pass to you the version that includes Dina's comments.

thanks!

John Hannon Rona, I want to take a final once over o... 12/06/2009 10:47:05 AM

From: John Hannon/DC/USEPA/US  
 To: Rona Birnbaum/DC/USEPA/US@EPA  
 Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, David Chalmers/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
 Date: 12/06/2009 10:47 AM  
 Subject: Re: Status of RTC Volumes

Rona, I want to take a final once over on 5, 6, and 7 when they are ready. I'm not going over 2,3,4, or 8. I'm done with 9, just sent edits, and done with 11. I'm still going to go over 1 and 10, and will do that next but that should be quick.

John Hannon  
 Office of General Counsel  
 U.S. Environmental Protection Agency  
 1200 Pennsylvania Ave. NW (MC 2344A)  
 Washington, D.C. 20460  
 Phone (202) 564-5563  
 Fax (202) 564-5603

Rona Birnbaum ALL: status as of 5:15 pm. Vol 1: final d... 12/05/2009 05:15:22 PM

From: Rona Birnbaum/DC/USEPA/US  
 To: Jason Samenow/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, David Chalmers/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA  
 Cc: Dina Kruger/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA  
 Date: 12/05/2009 05:15 PM  
 Subject: Status of RTC Volumes

ALL: status as of 5:15 pm.

Vol 1: final draft now with Dina, John, Carol. Went to ERG for final editing. Any final comments will be made directly onto the edited version in morning.

Vol 2: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version.

Vol 3: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version.

Vol 4: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version.



Vol 5: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version.

Vol 6: OGC review complete. Dina reviewing final Ag draft tonight. Final forestry draft will be sent tonight and final review tomorrow morning. Will also be sent OGC if John wants to have another look at that time. Will go to ERG tonight.

Vol 7: OGC review complete. Final draft with Dina and with ERG. Any final comments will be made directly onto the edited version in morning.

Vol 8: Dina + OGC review complete. Copy edited version expected back from ERG around 6:00 and final edits will be made directly onto the edited version. (A few lingering specific comments being worked out.)

Vol 9: final draft now with Dina, Rona, John, Carol. Is with ERG for editing. Any final comments will be made directly onto the edited version in morning.

Vol 10: final draft will be sent to Dina, Rona, John, Carol at 6:00 tonight. Final draft will also be sent to ERG at 6:00. Final review will be completed in the morning and edits made directly onto the edited version.

Vol 11: final draft with Dina. A few responses expected to be update [REDACTED] OGC review complete but will review the updated responses. Already went to ERG and final edits will be made directly onto the edited version.

On all Volumes: Rona, Dina, Carol and John are ready to address any specific questions on comments/responses.

David: please update the checklist for docketing.

**ALL Volumes to be completed by 6:00 Sunday (many should be completed before then). At that point, Bill will work with the Web people to upload all volumes onto the staging server. Once up, we all will still be able to continue with minor polishing, cross-checking, etc. We want to be completed by Monday morning, although minor things can still be tweaked, if needed, on Monday morning.**

**We're almost there!!**

EPA-3081

**William Perkins**

04/05/2010 04:44 PM

To

cc

bcc

Subject UPGRADE G:\CCD\CSIB\Endangerment\Contracting support\FINAL CLOSEOUT ARCHIVE FROM ERG\ARCHIVE DVD #1\DVDs For Bill\Commenter References.pdf

(b)(5) Deliberative

 - Commenter References.pdf

EPA-EF-005243

EPA-3082

**Ben DeAngelo**

04/06/2010 04:56 PM

To

cc

bcc

Subject UPLoad C:\Documents and Settings\owner\My Documents\Endangerment\Response to Public Comments\Drought and Fire comment BJD.doc

(b)(5) Deliberative

- Drought and Fire comment BJD.doc

EPA-EF-005244

EPA-3083

**Lesley**  
**Jantarasami/DC/USEPA/US**  
12/06/2009 03:32 PM

To Jeremy Martinich  
cc  
bcc

Subject two comments for vol 7

Hey Roxie, I mean, Jeremy -

Here are two comments summarized from Idso. I drafted one part of one response. If you need it, I'm happy to write some more, but I'll need you to outline what to say.

(b)(5) Deliberative

Idso Volume 7 Comments.doc

Cheers,

Lesley

EPA-3084

**Ben DeAngelo**

04/06/2010 04:56 PM

To

cc

bcc

Subject UPGOAD C:\Documents and Settings\owner\My Documents\Endangerment\Response to Public Comments\Materials Submitted or Referred to in Public Comments EPA-HQ-OAR-2009-0171.pdf



- Materials Submitted or Referred to in Public Comments EPA-HQ-OAR-2009-0171.pdf

available at  
[regulations.gov](http://www.regulations.gov)

EPA-3085

**Jeremy  
Martinich/DC/USEPA/US**  
12/06/2009 03:38 PM

To John Hannon, Carol Holmes  
cc Dina Kruger, Rona Birnbaum  
bcc  
Subject Final Version of 1.1.1 (response to literature submitted)

Because there has been so much back and forth on this comment, I thought that I would resend it around to everyone as an fyi. John, we took your comment (b)(5) Deliberative

Not need to respond to this email unless you have additional comments.

**Comment (1-1):**

(b)(5) Deliberative

**Response (1-1):**

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative



John Hannon Here are my comments on Vol 1, on Ca... 12/06/2009 12:52:21 PM

From: John Hannon/DC/USEPA/US  
 To: Carol Holmes/DC/USEPA/US@EPA  
 Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA  
 Date: 12/06/2009 12:52 PM  
 Subject: Re: Volume 1 for final OGC review -- grr, with attachment

Here are my comments on Vol 1, on Carol's version.

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09 CSH 5pm -jh1206.doc" deleted by Jeremy Martinich/DC/USEPA/US]

John Hannon  
 Office of General Counsel  
 U.S. Environmental Protection Agency  
 1200 Pennsylvania Ave. NW (MC 2344A)  
 Washington, D.C. 20460  
 Phone (202) 564-5563  
 Fax (202) 564-5603

Carol Holmes Confidential communication for internal... 12/05/2009 07:33:49 PM

From: Carol Holmes/DC/USEPA/US  
 To: Jeremy Martinich/DC/USEPA/US@EPA  
 Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA  
 Date: 12/05/2009 07:33 PM  
 Subject: Re: Volume 1 for final OGC review -- grr, with attachment

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09 CSH 5pm.doc" deleted by Jeremy Martinich/DC/USEPA/US]

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Carol S. Holmes  
 Office of General Counsel  
 U.S. Environmental Protection Agency  
 1200 Pennsylvania Ave, NW (MC 2344A)  
 Washington, DC 20460  
 Phone (202) 564-8709  
 Fax (202) 564-5603

Jeremy Martinich Hi John and Carol, Here's all of Volu... 12/05/2009 04:00:28 PM

From: Jeremy Martinich/DC/USEPA/US  
 To: John Hannon/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA  
 Cc: Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA  
 Date: 12/05/2009 04:00 PM



Subject: Volume 1 for final OGC review

---

Hi John and Carol,

Here's all of Volume 1 for your review. Hopefully everything is solid by now, but please send me any final edits.

Note that the comment numbers are still off.

Thanks,  
Jeremy

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09.doc" deleted by Carol Holmes/DC/USEPA/US]

EPA-3086

Carol Holmes/DC/USEPA/US  
12/06/2009 03:42 PM

To Ben DeAngelo  
cc John Hannon, Lesley Jantarasami  
bcc  
Subject Re: vol 9 or vol 11 comment?

I think [REDACTED] (b)(5) Deliberative [REDACTED]

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Carol S. Holmes  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave, NW (MC 2344A)  
Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

Ben DeAngelo Carol: this comment/response is in vol... 12/06/2009 03:38:32 PM

From: Ben DeAngelo/DC/USEPA/US  
To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Lesley Jantarasami/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA  
Date: 12/06/2009 03:38 PM  
Subject: vol 9 or vol 11 comment?

Carol: this comment/response is in vol 9. You commented it's covered in vol 11. (b)(5) Deliberative

[REDACTED]


**Comment:**

[REDACTED] (b)(5) Deliberative [REDACTED]

**Response:**

[REDACTED] (b)(5) Deliberative [REDACTED]

(b)(5) Deliberative



EPA-3087

Erin Birgfeld/DC/USEPA/US

12/06/2009 03:43 PM

To "Tuberson, Kyle"

cc CDeLoose, ktuberson, Mausami Desai, mausamid,  
"Stambaugh, Sandi", Stacy Kika, William Perkins, Carole  
Cook

bcc

Subject Endangerment web edits

Hi Kyle,

We have reformatted the press kit materials and the FAQ's. Could your please replace these files with the attached? Please Thanks!

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative

climate change facts.doc environmental and welfare effects.doc health.doc legal basis.doc Light Duty Vehicle Program.doc

In addition, here are some redline strikeout comments for the pages themselves.

(b)(5) Deliberative

Endangerment and Cause or Contribute Findings for Greenhouse Gases under the Clean Air Act - web edits elb.doc

One thing to note, we have decided that linking to the data files directly from the main endangerment page is confusing so we would like to delete the LINK from the endangerment page but keep the data page up so that folks can link to it from the TSD and the Findings document themselves. I'm in the office right now so please call if you have questions.

Thanks!

-Erin

Erin Birgfeld  
Director of Communications  
Climate Change Division  
U.S. Environmental Protection Agency  
phone: (202) 343-9079  
fax: (202) 343-2202

EPA-EF-005253

EPA-3088

**Ben DeAngelo**

04/06/2010 04:56 PM

To

cc

bcc

Subject UPLoad C:\Documents and Settings\owner\My Documents\Endangerment\Response to Public Comments\RTC draft Volume New 11 12-05-09 to ERG.doc

(b)(5) Deliberative

- RTC draft Volume New 11 12-05-09 to ERG.doc

EPA-EF-005254

EPA-3089

**Marcus Sarofim**

To

cc

bcc

Subject UPGRADE C:\Documents and Settings\msarofim\My Documents\WorkFolder\Tsd\_Anpr\ResponseToComments\Final\Volumes\models 9 to vol 4-mcs.doc

(b)(5) Deliberative

- models 9 to vol 4-mcs.doc

EPA-3090

Jason  
Samenow/DC/USEPA/US  
12/06/2009 03:48 PM

To Marcus Sarofim, Ben DeAngelo  
cc  
bcc  
Subject re: water vapor

Guys-- Do we think [REDACTED] (b)(5) Deliberative

Marcus Sarofim [REDACTED] (b)(5) Deliberative 12/04/2009 01:23:33 PM

From: Marcus Sarofim/DC/USEPA/US  
To: Jason Samenow/DC/USEPA/US@EPA  
Date: 12/04/2009 01:23 PM  
Subject: FYI on water

[REDACTED] (b)(5) Deliberative

-Marcus

Volume 3:  
Miskolczi

[REDACTED] (b)(5) Deliberative

Volume 2:

[REDACTED] (b)(5) Deliberative

Volume 4:  
Water vapor trends in atmosphere

Volume Cause & Contribute:

[REDACTED] (b)(5) Deliberative

**(b)(5) Deliberative**

Volume Endangerment:

Response:

(b)(5) Deliberative

[Redacted]

Comment:

(b)(5) Deliberative

Response:

(b)(5) Deliberative

Marcus C. Sarofim, PhD  
phone: 202-343-9993



fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

EPA-3091

**Lesley Jantarasami**  
04/01/2010 03:52 PM

To  
cc  
bcc

Subject UPGLOAD C:\Documents and Settings\ljantara\My Documents\Endangerment\02\_Comments and Responses\Vol 9 and 12 stuff\vol 11 second-round edited.doc

(b)(5) Deliberative

- vol 11 second-round edited.doc

EPA-3092

**Lesley Jantarasami**  
04/01/2010 03:45 PM

To  
cc  
bcc

Subject UPGLOAD C:\Documents and Settings\ljantara\My  
Documents\Endangerment\01\_Full Doc\Review Volumes\vol  
10 second-round edited.doc

(b)(5) Deliberative

- vol 10 second-round edited.doc

EPA-3093

William  
Perkins/DC/USEPA/US  
12/06/2009 04:10 PM

To Ben DeAngelo  
cc  
bcc  
Subject Fw: Volume 9

Bill Perkins  
Climate Change Adaptation Analyst  
Climate Science and Impacts Branch  
Climate Change Division  
U.S. Environmental Protection Agency  
perkins.william@epa.gov  
(O) 202.343.9460  
(F) 202.343.2202  
(C) (b)(6)

----- Forwarded by William Perkins/DC/USEPA/US on 12/06/2009 04:10 PM -----

From: "Matthew Mitchell" <Matthew.Mitchell@erg.com>  
To: Lesley Jantarasami/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Cc: "Mae Thomas" <Mae.Thomas@erg.com>, "Sue Eisenfeld" <Sue.Eisenfeld@erg.com>  
Date: 12/06/2009 04:09 PM  
Subject: Volume 9

---

Here's Volume 9.

Matthew N. Mitchell  
ERG  
110 Hartwell Avenue  
Lexington, MA 02421-3136  
(p) 781-674-7331  
(f) 781-674-2851

(b)(5) Deliberative

vol 9 first-round edited.doc

EPA-EF-005261

EPA-3094

Carol Holmes/DC/USEPA/US  
12/06/2009 04:12 PM

To Ben DeAngelo  
cc Dina Kruger, John Hannon, Rona Birnbaum  
bcc  
Subject Re: new comment in vol 9 that (b)(5) Deliberative

Hi Ben -- I was just looking for anything more we could get. (b)(5) Deliberative  
The two sentences you added were good. If Dina and/or Rona can come up with more, all the better. THANKS

Confidential communication for internal deliberations only; Attorney-client, attorney work product and/or enforcement privilege; Do not distribute outside EPA or DOJ

Carol S. Holmes  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave, NW (MC 2344A)  
Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

Ben DeAngelo Carol: you added this comment in 9 an... 12/06/2009 03:57:47 PM

From: Ben DeAngelo/DC/USEPA/US  
To: Carol Holmes/DC/USEPA/US@EPA  
Cc: John Hannon/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 03:57 PM  
Subject: new comment in vol 9 that (b)(5) Deliberative

Carol: you added this comment in 9 and asked us to add info from an OAR policy perspective. (b)(5) Deliberative


**Comment:**

(b)(5) Deliberative

**Response:**

(b)(5) Deliberative

(b)(5) Deliberative



EPA-3095

**Ben DeAngelo**

04/06/2010 04:56 PM

To

cc

bcc

Subject UPLoad C:\Documents and Settings\owner\My Documents\Endangerment\Response to Public Comments\RTC draft Volume 9 120509 BJD -jh1206 csh.doc

(b)(5) Deliberative

- RTC draft Volume 9 120509 BJD -jh1206 csh.doc

EPA-EF-005264

EPA-3096

Lesley  
Jantarasami/DC/USEPA/US  
12/06/2009 04:16 PM

To "Matthew Mitchell"  
cc "Sue Eisenfeld", William Perkins  
bcc  
Subject Re: Fw: reference issue

Sounds good- thanks for this. I'll pass it along to all the volume authors.

Lesley

|                    |   |                        |
|--------------------|---|------------------------|
| "Matthew Mitchell" | I do, I think, recommend using the j... | 12/06/2009 04:14:26 PM |
|--------------------|---|------------------------|

From: "Matthew Mitchell" <Matthew.Mitchell@erg.com>  
 To: William Perkins/DC/USEPA/US@EPA, "Sue Eisenfeld" <Sue.Eisenfeld@erg.com>  
 Cc: Lesley Jantarasami/DC/USEPA/US@EPA  
 Date: 12/06/2009 04:14 PM  
 Subject: Re: Fw: reference issue

I do, I think, recommend using the [REDACTED] (b)(5) Deliberative

[REDACTED]

[REDACTED] (b)(5) Deliberative

Matthew N. Mitchell  
 ERG  
 110 Hartwell Avenue  
 Lexington, MA 02421-3136  
 (p) 781-674-7331  
 (f) 781-674-2851  
 >>> <Perkins.William@epamail.epa.gov> 12/06/09 3:57 PM >>>

Matt and Sue,

Please see the correspondence chain below. If you agree with the approach of listing the author as the one in the most recent version, then could you please send us a properly formatted citation that we can use across all the volumes?

If you agree with the approach, please send the language to Lesley and I. If you disagree based on convention, please send us a suggestion for action. Please call Lesley with any questions on this specific issue at 202.343.9929.

Thank you.

Cheers,

Bill

Bill Perkins

EPA-EF-005265



Climate Change Adaptation Analyst  
Climate Science and Impacts Branch  
Climate Change Division  
U.S. Environmental Protection Agency  
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(F) 202.343.2202  
(C) (b)(6)

----- Forwarded by William Perkins/DC/USEPA/US on 12/06/2009 03:53 PM  
-----

From: Lesley Jantarasami/DC/USEPA/US  
To: William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 03:13 PM  
Subject: Fw: reference issue

What do you think about getting ERG's take on this issue? Or at least having them send us a properly formatted citation with just one author

(b)(5) Deliberative

(b)(5) Deliberative

Having said that, I think that the best thing to do would be to reference the

(b)(5) Deliberative

Specifically, the (b)(5) Deliberative

Marcus and I noticed that the Vol. 4 reference list includes the following:

(b)(5) Deliberative

A large black rectangular redaction box covers the majority of the page's content. The text "(b)(5) Deliberative" is centered within this redacted area.

[attachment "EPA-HQ-OAR-2009-0171-4035.1.pdf" deleted by Marcus Sarofim/DC/USEPA/US]

EPA-3097

Rona  
Birnbaum/DC/USEPA/US  
12/06/2009 04:17 PM

To Carol Holmes  
cc Dina Kruger, Jeremy Martinich, John Hannon  
bcc  
Subject Re: USE THIS ONE: Final Version of 1.1.1 (response to literature submitted)

I've talked briefly with Carol and just for a moment with John. Lets all talk at 5:00 pm. We'll call John at his home number and Carol on her cell number.  
thanks, Rona

Carol Holmes why not? Confidential communication f... 12/06/2009 03:45:32|PM

From: Carol Holmes/DC/USEPA/US  
To: Jeremy Martinich/DC/USEPA/US@EPA  
Cc: Dina Kruger/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 03:45 PM  
Subject: Re: USE THIS ONE: Final Version of 1.1.1 (response to literature submitted)

why not?

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Carol S. Holmes  
Office of General Counsel  
U.S. Environmental Protection Agency  
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Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

Jeremy Martinich (b)(5) Deliberative 12/06/2009 03:45:02|PM

From: Jeremy Martinich/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA  
Cc: Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 03:45 PM  
Subject: USE THIS ONE: Final Version of 1.1.1 (response to literature submitted)

(b)(5) Deliberative

Comment (1-1):

(b)(5) Deliberative

(b)(5) Deliberative

Response (1-1):

(b)(5) Deliberative

[Redacted]

[Redacted]

[Redacted]

[Redacted]

[Redacted]

[Redacted]

[Redacted]

[Redacted]

(b)(5) Deliberative

[Redacted]

[Redacted]

\*\*\*\*\*

Jeremy Martinich  
USEPA, Climate Change Division  
202-343-9871

----- Forwarded by Jeremy Martinich/DC/USEPA/US on 12/06/2009 03:42 PM -----

From: Jeremy Martinich/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA  
Cc: Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 03:38 PM  
Subject: Final Version of 1.1.1 (response to literature submitted)

Because there has been so much back and forth on this comment, I thought that I would resend it around to everyone as an fyi. John, we took your comment [Redacted] (b)(5) Deliberative

Not need to respond to this email unless you have additional comments.

\*\*\*\*\*

Jeremy Martinich  
USEPA, Climate Change Division  
202-343-9871

John Hannon      Here are my comments on Vol 1, on Ca...      12/06/2009 12:52:21 PM

From: John Hannon/DC/USEPA/US

To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA  
Date: 12/06/2009 12:52 PM  
Subject: Re: Volume 1 for final OGC review -- grr, with attachment

---

Here are my comments on Vol 1, on Carol's version.

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09 CSH 5pm -jh1206.doc" deleted by Jeremy Martinich/DC/USEPA/US]

John Hannon  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave. NW (MC 2344A)  
Washington, D.C. 20460  
Phone (202) 564-5563  
Fax (202) 564-5603

Carol Holmes Confidential communication for internal... 12/05/2009 07:33:49 PM

From: Carol Holmes/DC/USEPA/US  
To: Jeremy Martinich/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA  
Date: 12/05/2009 07:33 PM  
Subject: Re: Volume 1 for final OGC review -- grr, with attachment

---

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09 CSH 5pm.doc" deleted by Jeremy Martinich/DC/USEPA/US]

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---

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Office of General Counsel  
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1200 Pennsylvania Ave, NW (MC 2344A)  
Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

---

Jeremy Martinich Hi John and Carol, Here's all of Volu... 12/05/2009 04:00:28 PM

From: Jeremy Martinich/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA  
Cc: Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Ben DeAngelo/DC/USEPA/US@EPA  
Date: 12/05/2009 04:00 PM  
Subject: Volume 1 for final OGC review

---

Hi John and Carol,

Here's all of Volume 1 for your review. Hopefully everything is solid by now, but please send me any final edits.

Note that the comment numbers are still off.

Thanks,  
Jeremy

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09.doc" deleted by Carol Holmes/DC/USEPA/US]

EPA-3098

Erin Birgfeld/DC/USEPA/US

12/06/2009 04:21 PM

To Erin Birgfeld

cc Carole Cook, CDeLoose, "Tuberson, Kyle", Mausami Desai, (b)(6), "Stambaugh, Sandi", Stacy Kika, William Perkins

bcc

Subject Re: Endangerment web edits

Hi Kyle,

Attached are the FAQ's (which I neglected to send you the first time around) and the timeline which also needs to be updated. Would all these edits be available on the 5 o'clock update do you think?

Thanks!

Erin

Erin Birgfeld

Director of Communications

Climate Change Division

U.S. Environmental Protection Agency

phone: (202) 343-9079

fax: (202) 343-2202

(b)(5) Deliberative (b)(5) Deliberative

FinalTimeLine.ppt FAQs.doc

Erin Birgfeld

Hi Kyle, We have reformatted the press...

12/06/2009 03:43:49 PM

From: Erin Birgfeld/DC/USEPA/US  
To: "Tuberson, Kyle" <KTuberson@icfi.com>  
Cc: CDeLoose@icfi.com, ktuberson@icfi.com, Mausami Desai/DC/USEPA/US@EPA, (b)(6), "Stambaugh, Sandi" <SStambaugh@icfi.com>, Stacy Kika/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA, Carole Cook/DC/USEPA/US@EPA  
Date: 12/06/2009 03:43 PM  
Subject: Endangerment web edits

Hi Kyle,

We have reformatted the press kit materials and the FAQ's. Could your please replace these files with the attached? Please Thanks!

[attachment "climate change facts.doc" deleted by Erin Birgfeld/DC/USEPA/US] [attachment "environmental and welfare effects.doc" deleted by Erin Birgfeld/DC/USEPA/US] [attachment "health.doc" deleted by Erin Birgfeld/DC/USEPA/US] [attachment "legal basis.doc" deleted by Erin Birgfeld/DC/USEPA/US] [attachment "Light Duty Vehicle Program.doc" deleted by Erin Birgfeld/DC/USEPA/US]

In addition, here are some redline strikeout comments for the pages themselves.

[attachment "Endangerment and Cause or Contribute Findings for Greenhouse Gases under the Clean Air Act - web edits elb.doc" deleted by Erin Birgfeld/DC/USEPA/US]

One thing to note, we have decided that linking to the data files directly from the main endangerment page is confusing so we would like to delete the LINK from the endangerment page but keep the data

EPA-EF-005273



page up so that folks can link to it from the TSD and the Findings document themselves. I'm in the office right now so please call if you have questions.

Thanks!

-Erin

Erin Birgfeld  
Director of Communications  
Climate Change Division  
U.S. Environmental Protection Agency  
phone: (202) 343-9079  
fax: (202) 343-2202

EPA-3099

**Ben DeAngelo**

04/06/2010 04:57 PM

To

cc

bcc

Subject UPGOAD C:\Documents and Settings\owner\My Documents\Endangerment\Response to Public Comments\vol 10 second-round edited.doc

(b)(5) Deliberative

- vol 10 second-round edited.doc

EPA-3100

Jeremy  
Martinich/DC/USEPA/US  
12/06/2009 04:24 PM

To Dina Kruger  
cc Rona Birnbaum  
bcc  
Subject "Almost exclusively" issue

**Comment (1-8):**

[Redacted] (b)(5) Deliberative [Redacted]

**Response (1-8):**

[Redacted] (b)(5) Deliberative [Redacted]

[Redacted]

[Redacted]

[Redacted]

(b)(5) Deliberative  
[Redacted]

[Redacted]

[Redacted]

\*\*\*\*\*

Jeremy Martinich  
USEPA, Climate Change Division  
202-343-9871

EPA-3101

**Lesley Jantarasami**  
04/01/2010 03:51 PM

To  
cc  
bcc

Subject UPGLOAD C:\Documents and Settings\ljantara\My Documents\Endangerment\02\_Comments and Responses\Vol 7 stuff\ldso Volume 7 Comments.doc

(b)(5) Deliberative

- ldso Volume 7 Comments.doc

EPA-3102

**Lesley Jantarasami**  
04/01/2010 03:51 PM

To  
cc  
bcc

Subject UPGRADE C:\Documents and Settings\ljantara\My Documents\Endangerment\02\_Comments and Responses\Vol 6 stuff\Additional Vol 6 Drought and Fire comment.doc

(b)(5) Deliberative

- Additional Vol 6 Drought and Fire comment.doc

EPA-3103

Lesley  
Jantarasami/DC/USEPA/US  
12/06/2009 04:30 PM

To Marcus Sarofim  
cc Ben DeAngelo, Carol Holmes, David Chalmers, Jason Samenow, Jeremy Martinich, John Hannon, Rona Birnbaum, William Perkins  
bcc  
Subject Re: reference issue

Ok, so for all of you volume leads that have references [redacted] (b)(5) Deliberative

[redacted]

Thanks,

Lesley

Marcus Sarofim [redacted] (b)(5) Deliberative 12/06/2009 11:15:08 AM

From: Marcus Sarofim/DC/USEPA/US  
To: Rona Birnbaum/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, David Chalmers/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 11:15 AM  
Subject: Re: reference issue

[redacted] (b)(5) Deliberative

[redacted]

-Marcus

ps. I note that [redacted] (b)(5) Deliberative

Marcus C. Sarofim, PhD  
phone: 202-343-9993  
fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

Rona Birnbaum [redacted] Marcus/David: has this been confirmed... 12/06/2009 11:05:43 AM

From: Rona Birnbaum/DC/USEPA/US  
To: Marcus Sarofim/DC/USEPA/US@EPA

EPA-EF-005280

Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, David Chalmers/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 11:05 AM  
Subject: Re: reference issue

Marcus/David:  
has this been confirmed? - - (b)(5) Deliberative  
If so, every Volume that mentions it must be made consistent.

Marcus Sarofim Specifically, the (b)(5) Deliberative 12/03/2009 10:56:33 AM

From: Marcus Sarofim/DC/USEPA/US  
To: David Chalmers/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/03/2009 10:56 AM  
Subject: Re: reference issue

Specifically, the (b)(5) Deliberative

Marcus C. Sarofim, PhD  
phone: 202-343-9993  
fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

David Chalmers Marcus and I noticed that the Vol. 4 ref... 12/03/2009 10:54:28 AM

From: David Chalmers/DC/USEPA/US  
To: Rona Birnbaum/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA, Michael Kolian/DC/USEPA/US@EPA, Jason Samenow/DC/USEPA/US@EPA, William Perkins/DC/USEPA/US@EPA  
Date: 12/03/2009 10:54 AM  
Subject: reference issue

Marcus and I noticed that the Vol. 4 reference list includes the following:

(b)(5) Deliberative



(b)(5) Deliberative

[attachment "EPA-HQ-OAR-2009-0171-4035.1.pdf" deleted by Marcus Sarofim/DC/USEPA/US]

EPA-3105

Dina Kruger/DC/USEPA/US  
12/06/2009 04:37 PM

To Lesley Jantarasami, Rona Birnbaum, Ben DeAngelo  
cc  
bcc

Subject Vol 6 - forests

Looks great. I was not sure if John had stuff too, so if there is anything I should still look at, let me know. I'm going for coffee with Rona. I'll be here for some time yet.  
Next up: Vol 9.

(b)(5) Deliberative

vol 6 + dina 12 06.doc

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

EPA-EF-005283

EPA-3106

**Ben DeAngelo/DC/USEPA/US**

12/06/2009 04:43 PM

To Dina Kruger

cc

bcc

Subject version of clean vol 9

(b)(5) Deliberative

RTC draft Volume 9 120509 BJD -h1206.doc

EPA-3107

**Lesley**  
**Jantarasami/DC/USEPA/US**  
12/06/2009 04:47 PM

To John Hannon  
cc Rona Birnbaum  
bcc  
Subject Vol 6 - forestry

Hi John,

This latest version includes Dina's edits. And thanks for your suggested language, you'll see we added it into one of the first big responses.

(b)(5) Deliberative

RTC draft Volume 6 Forestry Only 12-06-09 .doc

Lesley

EPA-3108

**Jason  
Samenow/DC/USEPA/US**  
12/06/2009 04:50 PM

To David Chalmers  
cc  
bcc  
Subject Re: can you please send me the most recent version of vol  
2?

(b)(5) Deliberative

vol 2 120709.doc

David Chalmers Thanks

12/06/2009 04:49:00 PM

From: David Chalmers/DC/USEPA/US  
To: Jason Samenow/DC/USEPA/US@EPA  
Date: 12/06/2009 04:49 PM  
Subject: can you please send me the most recent version of vol 2?

---

Thanks

EPA-3109

William  
Perkins/DC/USEPA/US  
12/06/2009 05:03 PM

To Rona Birnbaum  
cc  
bcc  
Subject Vol8 R1 for your quick review

Rona,

This is the only comment that [REDACTED] (b)(5) Deliberative

[REDACTED] I think it is good to go. Thank you.

Cheers,

Bill

(b)(5) Deliberative

Vol8.1 R1 to Rona.doc

Bill Perkins  
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Climate Science and Impacts Branch  
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perkins.william@epa.gov  
(O) 202.343.9460  
(F) 202.343.2202  
(C) [REDACTED] (b)(6)

EPA-EF-005287

EPA-3110

Marcus  
Sarofim/DC/USEPA/US  
12/06/2009 05:13 PM

To Jason Samenow  
cc Dina Kruger  
bcc  
Subject Re: Looking for a duplicative comment

(b)(5) Deliberative

might it have migrated into Volume 11?

Marcus C. Sarofim, PhD  
phone: 202-343-9993  
fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

Jason Samenow dina- i don't think we have anything in... 12/06/2009 05:11:23 PM

From: Jason Samenow/DC/USEPA/US  
To: Dina Kruger/DC/USEPA/US@EPA  
Cc: Marcus Sarofim/DC/USEPA/US@EPA  
Date: 12/06/2009 05:11 PM  
Subject: Re: Looking for a duplicative comment

dina- i don't think we have anything in vol 5 on this. i looked at the direct effect comments, and don't see it. i'm about to go through vol 5 carefully, and will let you know if it comes up.

jason

Dina Kruger Do either of you know where the comm... 12/06/2009 04:57:32 PM

From: Dina Kruger/DC/USEPA/US  
To: Jason Samenow/DC/USEPA/US@EPA, Marcus Sarofim/DC/USEPA/US@EPA  
Date: 12/06/2009 04:57 PM  
Subject: Looking for a duplicative comment

Do either of you know where the comment (b)(5) Deliberative

If you are able to find it and clip it into an e-mail, I would be most grateful.

Thanks -

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

EPA-EF-005288

EPA-3111

**Lesley Jantarasami**  
04/01/2010 03:51 PM

To  
cc  
bcc

Subject UPGOAD C:\Documents and Settings\ljantara\My Documents\Endangerment\02\_Comments and Responses\Vol 6 stuff\vol 6 + dina 12 06.doc

(b)(5) Deliberative

- vol 6 + dina 12 06.doc



EPA-3112

**Jeremy  
Martinich/DC/USEPA/US**  
12/06/2009 05:18 PM

To Dina Kruger, Rona Birnbaum  
cc  
bcc


Subject Addition to comment on 'newness' of IPCC

Please see the new next in blue below and send me any comments you have.

Thanks,  
Jeremy

**Response (1-11):**

(b)(5) Deliberative



EPA-3113

**Ben DeAngelo**

04/06/2010 04:57 PM

To

cc

bcc

Subject UPGOAD C:\Documents and Settings\owner\My Documents\Endangerment\Response to Public Comments\vol 9 first-round edited.doc

(b)(5) Deliberative

- vol 9 first-round edited.doc

EPA-3114

Jason  
Samenow/DC/USEPA/US  
12/06/2009 05:25 PM

To Marcus Sarofim  
cc  
bcc

Subject Fw: requests for ERG on vol 2

Marcus-- FYI... Just sent Vol 2 off the ERG for one more minor QC round. When we get it back, we can add in # references.

Jason

----- Forwarded by Jason Samenow/DC/USEPA/US on 12/06/2009 05:24 PM -----

From: Jason Samenow/DC/USEPA/US  
To: William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 05:24 PM  
Subject: requests for ERG on vol 2

Instructions for ERG on Volume 2:

- 1) Address all margin comment bubbles directed to "ERG" in both the RTC and reference attachment and adjust references based on margin bubbles as necessary
- 2) Add the 2 comments and responses below to the Extreme Event section of this volume (at the end is fine), and renumber comments/responses beneath that. (note: the references cited in these RTCs are already in the TSD).
- 3) Making any necessary formatting adjustments to the Appendices. (b)(5) Deliberative
- 4) Merge references (in separate document) with main volume

Thanks so much...  
Jason

**Comment:**

(b)(5) Deliberative

**Response:**

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative

**Comment:**

(b)(5) Deliberative

**Response:**

(b)(5) Deliberative

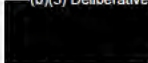


hadcru-temperature.htm



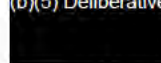
hadcru-availability.htm

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vol 2 120709.doc

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references vol 2 120709.doc

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[Climatic Research Unit : Data](#)

## CRU Data Availability

The Climatic Research Unit (CRU) at the University of East Anglia (UEA) has, since 1982, made available gridded datasets of surface temperature data over land areas and averages for the Northern and Southern Hemispheres and the Globe. Until the development of the internet these were made available via various media. These datasets (the latest being CRUTEM3 <http://www.cru.uea.ac.uk/cru/data/temperature/>) have been developed from data acquired from weather stations around the world. Almost all these weather stations are run by National Meteorological Services (NMSs) and they exchange these data over the CLIMAT network, which is part of the World Meteorological Organization's (WMO) Global Telecommunications System (GTS). Much of the original data in the early 1980s came from publications entitled 'World Weather Records'. We also make use of data available from the National Climatic Data Center in Asheville, North Carolina (their [Global Historical Climatology Network](#), GHCN). We are also constantly striving to find additional, and homogenized data from a wide range of sources (see details of earlier work in the publications below). Both the gridded datasets and the station data archive have evolved over the years and we developed dataset version numbers in the early 1990s. The methodology we have used in developing the gridded datasets has been described in numerous publications in the climate literature (see list at the end of this document and also <http://www.cru.uea.ac.uk/cru/data/temperature/> and the linked FAQs).

Since the early 1980s, some NMSs, other organizations and individual scientists have given or sold us (see Hulme, 1994, for a summary of European data collection efforts) additional data for inclusion in the gridded datasets, often on the understanding that the data are only used for academic purposes with the full permission of the NMSs, organizations and scientists and the original station data are not passed onto third parties. Below we list the agreements that we still hold. We know that there were others, but cannot locate them, possibly as we've moved offices several times during the 1980s. Some date back at least 20 years. Additional agreements are unwritten and relate to partnerships we've made with scientists around the world and visitors to the CRU over this period. In some of the examples given, it can be clearly seen that our requests for data from NMSs have always stated that we would not make the data available to third parties. We included such statements as standard from the 1980s, as that is what many NMSs requested. The inability of some agencies to release climate data held is not uncommon in climate science. The Dutch Met Service (KNMI) run the European Climate Assessment and Dataset (ECA&D, <http://eca.knmi.nl/>) project. They are able to use much data in their numerous analyses, but they cannot make all the original daily station temperature and precipitation series available because of restrictions imposed by some of the data providers. A series of workshops (see Peterson and Manton, 2008 for details) has been held in diverse regions of the world to produce analyses of trends in extremes. NMSs are generally happy to release derived products from their data, even if they restrict access to their digital climate archives. A third example is the Global Precipitation Climatology Centre (<http://gpcc.dwd.de>), run by the German Weather Service (DWD) who make various versions of gridded precipitation datasets freely available, but due to restrictions imposed by data providers are not able to give access to any of the station monthly precipitation totals. The problem is a generic issue and arises from the need of many NMSs to be or aim to be cost neutral (i.e. sell the data to recoup the costs of making observations and preparing the data).

We receive numerous requests for these station data (not just monthly temperature averages, but precipitation totals and pressure averages as well). Requests come from a variety of sources, often for an individual station or all the stations in a region or a country. Sometimes these come because the data cannot be obtained locally or the requester does not have the resources to pay for what some NMSs charge for the data. These data are not ours to provide without the full permission of the relevant NMSs, organizations and scientists. We point enquirers to the GHCN web site. We hope in the future that we may be able to provide these data, jointly with the UK Met Office Hadley Centre, subject to

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obtaining consent for making them available from the rights holders. In developing gridded temperature datasets it is important to use as much station data as possible to fully characterise global- and regional-scale changes. Hence, restricting the grids to only including station data that can be freely exchanged would be detrimental to the gridded products in some parts of the world.

We are not in a position to supply data for a particular country not covered by the example agreements referred to earlier, as we have never had sufficient resources to keep track of the exact source of each individual monthly value. Since the 1980s, we have merged the data we have received into existing series or begun new ones, so it is impossible to say if all stations within a particular country or if all of an individual record should be freely available. Data storage availability in the 1980s meant that we were not able to keep the multiple sources for some sites, only the station series after adjustment for homogeneity issues. We, therefore, do not hold the original raw data but only the value-added (i.e. quality controlled and homogenized) data. The priorities we use when merging data from the same station from different sources are discussed in some of the literature cited below. Parts of series may have come from restricted sources, whilst the rest came from other sources. Furthermore, as stated in <http://www.cru.uea.ac.uk/cru/data/landstations/> we have never kept track of changes to country names, as it is only the location and the station's data that are important. So, extracting data for a single country isn't always a simple task.

We rely on the CLIMAT network for updating CRU data series in near-real time. After quality control at the Hadley Centre these data are made available (since 2000) at [http://hadobs.metoffice.com/crudem3/data/station\\_updates/](http://hadobs.metoffice.com/crudem3/data/station_updates/). Much climate data are now additionally available through the internet from NMSs, but these are often difficult to use as data series often refer to national numbering systems, which must be related back to WMO Station Identifiers. Furthermore a number of NMSs make homogenized data (after adjustments for example for site moves, instrument improvements and changes in the way averages are calculated) available in delayed mode over the internet. Some that provide both raw and homogenized versions, generally do not link the two sets of data together.

Some years ago, WMO enacted Resolution 40 (<http://www.map.meteoswiss.ch/map-doc/WMO/WMOresol40.htm>) which covers the exchange of meteorological data and many data products and services produced by NMSs. This resolution applies only to NMSs and whilst Annex 1 implies that much data should be freely available for research and operational uses (commercial is discussed separately in the resolution), many still impose conditions and charge for access (see the earlier discussion related to KNMI and GPCC).

The HadCRUT3 product is a blend of land surface (CRUTEM3) and sea surface temperatures (HadSST2), CRU developing the land series and the Hadley Centre the SST series. Real-time updates of both components are performed at the Hadley Centre (data available at <http://hadobs.metoffice.com/> and also on the CRU site). The collaboration has been ongoing for more than 20 years. A similar set of publications on the Hadley Centre site document the development of the SST datasets.

## Files

- [Data agreements \(Adobe Portable Document Format file\)](#)

## References

- Hulme, M., 1994: The cost of climate data: A European experience. *Weather* **49**, 168-176.
- Peterson, T.C. and Manton, M.J., 2008: Monitoring changes in climate extremes: a tale of international collaboration. *Bull. Amer. Meteorol. Soc.* **89**, 1266-1271.

## Literature describing the development of CRU land temperature datasets

- Brohan, P., Kennedy, J., Harris, I., Tett, S.F.B. and Jones, P.D., 2006: Uncertainty estimates in regional and global observed temperature changes: a new dataset from 1850. *J. Geophys. Res.* **111**, D12106,

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- Jones, P.D. and Moberg, A., 2003: Hemispheric and large-scale surface air temperature variations: An extensive revision and an update to 2001. *J. Climate* **16**, 206-223.
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- Jones, P.D. and Briffa, K.R., 1992: Global surface air temperature variations over the twentieth century: Part 1 Spatial, temporal and seasonal details. *The Holocene* **2**, 165-179.
- Jones, P.D., 1994: Hemispheric surface air temperature variations: a reanalysis and an update to 1993. *Journal of Climate* **7**, 1794-1802.
- Bradley, R.S., Kelly, P.M., Jones, P.D., Goodess, C.M. and Diaz, H.F., 1985: A Climatic Data Bank for Northern Hemisphere Land Areas, 1851-1980, U.S. Dept. of Energy, Carbon Dioxide Research Division, *Technical Report TRO17*, 335 pp.
- Jones, P.D., Raper, S.C.B., Santer, B.D., Cherry, B.S.G., Goodess, C.M., Kelly, P.M., Wigley, T.M.L., Bradley, R.S. and Diaz, H.F., 1985: A Grid Point Surface Air Temperature Data Set for the Northern Hemisphere, U.S. Dept. of Energy, Carbon Dioxide Research Division, *Technical Report TRO22*, 251 pp.
- Jones, P.D., Raper, S.C.B., Cherry, B.S.G., Goodess, C.M. and Wigley, T.M.L., 1986: A Grid Point Surface Air Temperature Data Set for the Southern Hemisphere, 1851-1984, U.S. Dept. of Energy, Carbon Dioxide Research Division, *Technical Report TR027*, 73 pp.

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These search terms are highlighted: **hadley cru temperature** These terms only appear in links pointing to this [Full version](#) page: **center**

[Climatic Research Unit: Data](#)

[Graph](#)  
Hemispheric and global averages [graph](#)  
(also available as a [EPS](#) and [PDE](#))

# Temperature

From the beginning of January 2006, we have replaced the various grid-box **temperature** anomaly (from the base period 1961-90) datasets with new versions, HadCRUT3 and CRUTEM3 (see Brohan et al., 2006). The datasets have been developed in conjunction with **Hadley** Centre of the UK Met Office. These datasets will be updated at roughly monthly intervals into the future. Hemispheric and global averages as monthly and annual values are available as separate files.

This text gives some brief information to users about the datasets including:

- [Scientific papers](#) that should be consulted for complete details and referenced if any of the datasets are used
- [Dataset terminology](#), [file formats](#) and [downloads](#) available
- [Answers to some frequently-asked questions](#)

The earlier versions (HadCRUT2 and CRUTEM2 and their variance adjusted versions) can be found [here](#). They are no longer being updated.

## References

- Brohan, P., J.J. Kennedy, I. Harris, S.F.B. Tett and P.D. Jones, 2006: Uncertainty estimates in regional and global observed **temperature** changes: a new dataset from 1850. *J. Geophysical Research* **111**, D12106, [doi:10.1029/2005JD006548](https://doi.org/10.1029/2005JD006548) -- [Available as PDF](#)
- Jones, P.D., New, M., Parker, D.E., Martin, S. and Rigor, I.G., 1999: Surface air **temperature** and its variations over the last 150 years. *Reviews of Geophysics* **37**, 173-199.
- Rayner, N.A., P. Brohan, D.E. Parker, C.K. Folland, J.J. Kennedy, M. Vanicek, T. Ansell and S.F.B. Tett, 2006: Improved analyses of changes and uncertainties in marine **temperature** measured in situ since the mid-nineteenth century: the HadSST2 dataset. *J. Climate*, **19**, 446-469.
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## Dataset Terminology

CRUTEM3CRUTEM3vHadCRUT3HadCRUT3vHadSST2Absolute

|   |
|---|
| land air <b>temperature</b> anomalies on a 5° by 5° grid-box basis  |
| variance adjusted version of CRUTEM3  |
| combined land and marine [sea surface <b>temperature</b> (SST) anomalies from HadSST2, see Rayner et al., 2006] <b>temperature</b> anomalies on a 5° by 5° grid-box basis |
| variance adjusted version of HadCRUT3   |

EPA-EF-005297



sea surface **temperature** anomalies from Rainer et al (2006)

Absolute temperatures for the base period 1961-90 (see Jones et al., 1999)

## File Formats

### CRUTEM3, CRUTEM3v, HadCRUT3, HadCRUT3v, Absolute ASCII file format

```
for year = 1850 to endyear
for month = 1 to 12 (or less in endyear)
format(2i6) year, month
for row = 1 to 36 (85-90N,80-85N,75-70N,...75-80S,80-85S,85-90S)
format(72(e10.3,1x)) 180W-175W,175W-170W,...,175-180E
```

Data represent **temperature** anomalies wrt 1961-90 °C

Missing values represented by -1.000e+30

Absolute is just the twelve monthly averages for 1961-90: there are no years

### HadSST2 ASCII file format

```
for year = 1850 to endyear
for month = 1 to 12 (or less in endyear)
format(2i12) month, year
for row = 1 to 36 (85-90N,80-85N,75-70N,...75-80S,80-85S,85-90S)
format(72(f7.2,1x)) 180W-175W,175W-170W,...,175-180E
```

Data represent **temperature** anomalies wrt 1961-90 °C

Missing values represented by -99.99

### Hemispheric/global average data file format

```
for year = 1850 to endyear
format(i5,13f7.3) year, 12 * monthly values, annual value
format(i5,12i7) year, 12 * percentage coverage of hemisphere or globe
```

Coverage of 0 means data not yet available

[NetCDF format](#) is read by many commercial data-processing packages (eg. [IDL](#)) and public-domain software (eg. [ncview](#), a NetCDF viewer, and [NCL](#), a scriptable data-manipulation and visualisation package)

## Data for Downloading

DatasetFull gridEnd month

Updated Hemispheric means **Hadley** CentreCRUTEM3 CRUTEM3v HadCRUT3 HadCRUT3v HadSST2 Absolute

|                                      |                                 |                       |                    |                    |                    |                               |
|--------------------------------------|---------------------------------|-----------------------|--------------------|--------------------|--------------------|-------------------------------|
| <a href="#">Zipped ASCII</a><br>2 MB | <a href="#">NetCDF</a><br>18 MB | 2009-02<br>2009-03-13 | <a href="#">NH</a> | <a href="#">SH</a> | <a href="#">GL</a> | <a href="#">HADLEY CENTRE</a> |
| <a href="#">Zipped ASCII</a><br>3 MB | <a href="#">NetCDF</a><br>18 MB | 2009-02<br>2009-03-13 | <a href="#">NH</a> | <a href="#">SH</a> | <a href="#">GL</a> |                               |
| <a href="#">Zipped ASCII</a><br>7 MB | <a href="#">NetCDF</a><br>18 MB | 2009-02<br>2009-03-12 | <a href="#">NH</a> | <a href="#">SH</a> | <a href="#">GL</a> | <a href="#">HADLEY CENTRE</a> |
| <a href="#">Zipped ASCII</a><br>7 MB | <a href="#">NetCDF</a><br>18 MB | 2009-02<br>2009-03-12 | <a href="#">NH</a> | <a href="#">SH</a> | <a href="#">GL</a> |                               |
| <a href="#">Zipped ASCII</a><br>3 MB | <a href="#">NetCDF</a><br>37 MB | 2009-02<br>2009-03-05 | <a href="#">NH</a> | <a href="#">SH</a> | <a href="#">GL</a> | <a href="#">HADLEY CENTRE</a> |
| <a href="#">Zipped ASCII</a><br>3 MB | <a href="#">NetCDF</a><br>63 KB |                       |                    |                    |                    |                               |

## Answers to Frequently-asked Questions

The answers given are intended to be brief rather than comprehensive. For complete details readers are referred to the scientific references already given.

*What are the basic raw data used?*

Over land regions of the world over 3000 monthly station **temperature** time series are used. Coverage is denser over the more populated parts of the world, particularly, the United States, southern Canada, Europe and Japan. Coverage is sparsest over the interior of the South American and African continents and over the Antarctic. The number of available stations was small during the 1850s, but increases to over 3000 stations during the 1951-90 period. For marine regions sea surface **temperature** (SST) measurements taken on board merchant and some naval vessels are used. As the majority come from the voluntary observing fleet, coverage is reduced away from the main shipping lanes and is minimal over the Southern Oceans. Maps/tables giving the density of coverage through time are given for land regions by Jones and Moberg (2003) and for the oceans by Rayner *et al.* (2003). Both these sources also extensively discuss the issue of consistency and homogeneity of the measurements through time and the steps that have made to ensure all non-climatic inhomogeneities have been removed.

*Why are sea surface temperatures rather than air temperatures used over the oceans?*

Over the ocean areas the most plentiful and most consistent measurements of **temperature** have been taken of the sea surface. Marine air temperatures (MAT) are also taken and would, ideally, be preferable when combining with land temperatures, but they involve more complex problems with homogeneity than SSTs (Rayner *et al.*, 2003). The problems are reduced using night only marine air **temperature** (NMAT) but at the expense of discarding approximately half the MAT data. Our use of SST anomalies implies that we are tacitly assuming that the anomalies of SST are in agreement with those of MAT. Many tests show that NMAT anomalies agree well with SST anomalies on seasonal and longer time scales in most open ocean areas. Globally the agreement is currently very good (Rayner *et al.*, 2003), even better than in Folland *et al.* (2001b). However, some regional discrepancies in open ocean trends have recently been found in the tropics (Christy *et al.*, 2001).

*Why are the temperatures expressed as anomalies from 1961-90?*

Stations on land are at different elevations, and different countries estimate average monthly temperatures using different methods and formulae. To avoid biases that could result from these problems, monthly average temperatures are reduced to anomalies from the period with best coverage (1961-90). For stations to be used, an estimate of the base period average must be calculated. Because many stations do not have complete records for the 1961-90 period several methods have been developed to estimate 1961-90 averages from neighbouring records or using other sources of data. Over the oceans, where observations are generally made from mobile platforms, it is impossible to assemble long series of actual temperatures for fixed points. However it is possible to interpolate historical data to create spatially complete reference climatologies (averages for 1961-90) so that individual observations can be compared with a local normal for the given day of the year.

*Why do anomalies not average exactly zero over 1961-90?*

Over both the land and marine domains considerable care has been taken in calculating the base period values for the 1961-90 period. However, as all regions don't have complete data for this 30-year period, the anomaly data do not average exactly to zero for this 30-year period. This also applies to the global and hemispheric average series as well as the individual grid-box series. However, the IPCC optimally averaged global and hemispheric time series (see later web address) are constrained to have anomalies that average to zero over 1961-90.

*How are the land and marine data combined?*

Both the component parts (land and marine) are separately interpolated to the same 5° x 5° latitude/longitude grid boxes. The combined versions (HadCRUT3 and HadCRUT3v) take values from each component and weight the grid boxes where both occur (coastlines and islands). The weighting method is described in detail in Jones *et al.* (2001). Land **temperature** anomalies are infilled where more than four of the surrounding eight 5° x 5° grid boxes are present, as discussed in Jones *et al.* (2001). Infilling doesn't take place when the box is ocean, except when it covered by sea ice based on 1961-90 average conditions.

*How accurate are the hemispheric and global averages?*

Annual values are approximately accurate to +/- 0.05°C (two standard errors) for the period since 1951. They are about four times as uncertain during the 1850s, with the accuracy improving gradually between 1860 and 1950 except for temporary deteriorations during data-sparse, wartime intervals. Estimating accuracy is a far from a trivial task as the individual grid-boxes are not independent of each other and the accuracy of each grid-box time series varies through time (although the variance adjustment has reduced this influence to a large extent). The issue is discussed extensively by Folland *et al.* (2001a,b) and Jones *et al.* (1997). Both Folland *et al.* (2001a,b) references extend discussion to the estimate of accuracy of trends in the global and hemispheric series, including the additional uncertainties related to homogeneity corrections.

In the hemispheric files averages are now given to a precision of three decimal places to enable seasonal values to be calculated to ±0.01°C. The extra precision implies no greater accuracy than two decimal places.

*Why do global and hemispheric **temperature** anomalies differ from those quoted in the IPCC assessment and the media?*

We have areally averaged grid-box **temperature** anomalies (using the HadCRUT3v dataset), with weighting according to the area of each 5° x 5° grid box, into hemispheric values; we then averaged these two values to create the global-average anomaly. However, the global and hemispheric anomalies used by IPCC and in the World Meteorological Organization and Met Office news releases were calculated using optimal averaging. This technique uses information on how temperatures at each location co-vary, to weight the data to take best account of areas where there are no observations at a given time. The method uses the same basic information (i.e. in future HadCRUT3v and subsequent improvements), along with the data-coverage and the measurement and sampling errors, to estimate uncertainties on the global and hemispheric average anomalies. The more elementary technique (used here) produces no estimates of uncertainties, but our results generally lie within the ranges estimated by optimum averaging. The constraint that the average be zero over 1961-90 in the optimal averages also adds a small offset compared to the other data described here.

The present optimal averages with annual uncertainties are [accessible from the Hadley Centre](#). The data include values filtered to show decadal and longer-term variations and uncertainties. This replaces the IPCC 2001 version at the above site (see Parker *et al.* 2004). All other versions of global and hemispheric **temperature** anomalies are only steps to the IPCC series.

*Why are values slightly different when I download an updated file a year later?*

All the files on this page (except Absolute) will be updated on a monthly basis to include the latest month within about four weeks of its completion. Updating includes not just data for the last month but the addition of any late reports for up to approximately the last two years. In addition to this the method of variance adjustment (used for CRUTEM3v and HadCRUT3v) works on the anomalous temperatures relative to the underlying trend on an approximate 30-year timescale. Estimating this trend requires estimation of grid-box temperatures for years before the start of each record and after the end. With the addition of subsequent years, the underlying trend will alter slightly, changing the variance-adjusted values. Effects will be greatest on the last year of the record, but an influence can be evident for the last three to four years. Full details of the variance adjustment procedure are given in Jones *et al.* (2001). Approximately yearly, the optimally averaged values will also be updated to take account of such additional past information

**See also**

EPA-EF-005300

- [CRU Information Sheet no. 1: Global Temperature Record](#)
- [Climate Monitor Online](#) has month-by-month visualisations of [gridded](#) and [hemispheric temperature](#).
- Todd Mitchell at JISAO also provides a NetCDF version of [Land/Ocean](#) grid.
- [CRUTEM2 and related datasets](#) will remain available in parallel for a while.
- [Examples plots of CRU data](#) using [NCAR Command Language \(NCL\)](#)
- [Land Stations used by the Climatic Research Unit within CRUTEM3](#)
- Farmer et al. 1989, "[Documenting and explaining recent global-mean temperature changes](#)" ([Adobe Portable Document Format file](#)) (17MB) - final report to NERC contract GR3/6565.

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*Last updated: June 2008, Phil Jones & Mike Salmon (plus automatic updates for data)*

EPA-3115

William Perkins/DC/USEPA/US  
12/06/2009 05:31 PM

To Jason Samenow  
cc  
bcc

Subject I have two questions -- please call me Re: requests for ERG on vol 2

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(C) (b)(6)

Jason Samenow | Instructions for ERG on Volume 2: 1)... 12/06/2009 05:24:29 PM

From: Jason Samenow/DC/USEPA/US  
To: William Perkins/DC/USEPA/US@EPA  
Date: 12/06/2009 05:24 PM  
Subject: requests for ERG on vol 2

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Thanks so much...  
Jason

**Comment:**

(b)(5) Deliberative

**Response:**

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**Response:**

(b)(5) Deliberative

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EPA-3116

**Marcus  
Sarofim/DC/USEPA/US**  
12/06/2009 05:32 PM

To Jeremy Martinich  
cc  
bcc

Subject from response 4-1

(b)(5) Deliberative

[Redacted]

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with the EPA Climate Division

EPA-3117

**Ben DeAngelo**

04/06/2010 04:57 PM

To

cc

bcc

Subject UPLoad C:\Documents and Settings\owner\My Documents\Endangerment\Response to Public Comments\vol 6 + dina 12 06.doc

(b)(5) Deliberative

- vol 6 + dina 12 06.doc

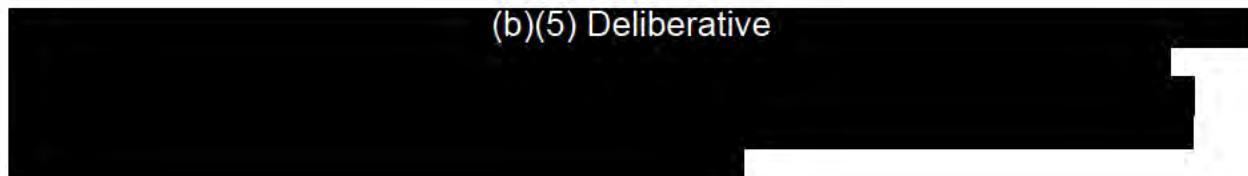


EPA-3118

Marcus  
Sarofim/DC/USEPA/US  
12/06/2009 05:44 PM

To Jason Samenow  
cc  
bcc  
Subject precip question

(b)(5) Deliberative



-Marcus

(b)(5) Deliberative



EPA-3119

**Lesley Jantarasami**  
04/01/2010 03:51 PM

To  
cc  
bcc

Subject UPGOAD C:\Documents and Settings\ljantara\My Documents\Endangerment\02\_Comments and Responses\Vol 6 stuff\RTC draft Volume 6 Forestry Only 12-06-09 .doc

(b)(5) Deliberative

- RTC draft Volume 6 Forestry Only 12-06-09 .doc

EPA-EF-005307

EPA-3120

Jason  
Samenow/DC/USEPA/US  
12/06/2009 05:46 PM

To Marcus Sarofim  
cc  
bcc  
Subject Re: precip question

looks good. thanks!

jason

Marcus Sarofim

(b)(5) Deliberative

12/06/2009 05:44:26 PM

From: Marcus Sarofim/DC/USEPA/US  
To: Jason Samenow/DC/USEPA/US@EPA  
Date: 12/06/2009 05:44 PM  
Subject: precip question

(b)(5) Deliberative

-Marcus

(b)(5) Deliberative

EPA-EF-005308

EPA-3121

**Rona**  
**Birnbaum/DC/USEPA/US**  
12/06/2009 05:59 PM

To Jason Samenow, Ben DeAngelo, Lesley Jantarasami,  
Jeremy Martinich, David Chalmers, Marcus Sarofim, William  
Perkins

cc

bcc

Subject Change to stock language

1. please make this change in the Foreword in ALL Volumes. It involves deleting one sentence and I also caught a small typo.

(b)(5) Deliberative

REVISED FOREWORD.doc

2. Please do a search in your volume to ensure that all Responses are consistent with #1 above.

3. Please do a search in your volume for (b)(5) Deliberative

EPA-3122

Marcus  
Sarofim/DC/USEPA/US  
12/06/2009 06:07 PM

To Jason Samenow  
cc  
bcc  
Subject snowpack response, volume 2

**Comment (3-14):**

(b)(5) Deliberative

**Response (3-14):**

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative

(b)(5) Deliberative

Marcus C. Sarofim, PhD  
phone: 202-343-9993  
fax: 202-343-2202  
1310 L Street 256C  
AAAS Science & Technology Policy Fellow  
with the EPA Climate Division

EPA-3123

**Lesley Jantarasami**  
04/01/2010 03:52 PM

To  
cc  
bcc

Subject UPGRADE C:\Documents and Settings\ljantara\My Documents\Endangerment\02\_Comments and Responses\Vol 9 and 12 stuff\vol 11 second-round edited COMPARE.doc

(b)(5) Deliberative

- vol 11 second-round edited COMPARE.doc

EPA-3124

Dina Kruger/DC/USEPA/US

12/06/2009 06:09 PM

To Ben DeAngelo

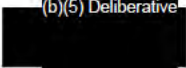
cc Rona Birnbaum

bcc

Subject Volume 9

Here are my edits.  (b)(5) Deliberative

Dina

 (b)(5) Deliberative

RTC draft Volume 9 120609+DINA.doc

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

EPA-EF-005313



EPA-3125

Ben DeAngelo/DC/USEPA/US

To Dina Kruger

12/06/2009 06:11 PM

cc Rona Birnbaum

bcc

Subject Re: Volume 9

Thanks. ERG copyedited yesterday's version so am talking with Bill about ERG doing a merge rather than re-doing all their copyediting work so far.

Dina Kruger

Here are my edits.

(b)(5) Deliberative

12/06/2009 06:09:42 PM

From: Dina Kruger/DC/USEPA/US  
To: Ben DeAngelo/DC/USEPA/US@EPA  
Cc: Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 06:09 PM  
Subject: Volume 9

Here are my edits.

(b)(5) Deliberative

Dina

[attachment "RTC draft Volume 9 120609+DINA.doc" deleted by Ben DeAngelo/DC/USEPA/US]

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

EPA-EF-005314

EPA-3126

Dina Kruger/DC/USEPA/US  
12/06/2009 06:13 PM

To Jeremy Martinich, Rona Birnbaum  
cc Jason Samenow  
bcc  
Subject

**This is good – my edits to the blue part are capitalized. (IPCC was already capitalized...)**

**Response (1-11):**

(b)(5) Deliberative

[Redacted]

[Redacted]

[Redacted]

Dina Kruger  
Director, Climate Change Division  
USEPA

202-343-9039 (phone)  
202-343-2290 (fax)

EPA-EF-005315

EPA-3127

Jeremy  
Martinich/DC/USEPA/US  
12/06/2009 06:14 PM

To John Hannon  
cc  
bcc

Subject Re: Volume 1 for final OGC review -- grr, with attachment

Thanks John,

FYI regarding your comment [REDACTED] (b)(5) Deliberative

\*\*\*\*\*

Jeremy Martinich  
USEPA, Climate Change Division  
202-343-9871

John Hannon Here are my comments on Vol 1, on Ca... 12/06/2009 12:52:21 PM

From: John Hannon/DC/USEPA/US  
To: Carol Holmes/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, Jeremy Martinich/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA  
Date: 12/06/2009 12:52 PM  
Subject: Re: Volume 1 for final OGC review -- grr, with attachment

Here are my comments on Vol 1, on Carol's version.

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09 CSH 5pm -jh1206.doc" deleted by Jeremy Martinich/DC/USEPA/US]

John Hannon  
Office of General Counsel  
U.S. Environmental Protection Agency  
1200 Pennsylvania Ave. NW (MC 2344A)  
Washington, D.C. 20460  
Phone (202) 564-5563  
Fax (202) 564-5603

Carol Holmes Confidential communication for internal... 12/05/2009 07:33:49 PM

From: Carol Holmes/DC/USEPA/US  
To: Jeremy Martinich/DC/USEPA/US@EPA  
Cc: Ben DeAngelo/DC/USEPA/US@EPA, Dina Kruger/DC/USEPA/US@EPA, John Hannon/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne Kocchi/DC/USEPA/US@EPA  
Date: 12/05/2009 07:33 PM  
Subject: Re: Volume 1 for final OGC review -- grr, with attachment

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09 CSH 5pm.doc" deleted by Jeremy Martinich/DC/USEPA/US]

EPA-EF-005316

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---

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Office of General Counsel  
U.S. Environmental Protection Agency  
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Washington, DC 20460  
Phone (202) 564-8709  
Fax (202) 564-5603

---

Jeremy Martinich    Hi John and Carol, Here's all of Volu...    12/05/2009 04:00:28 PM

From:            Jeremy Martinich/DC/USEPA/US  
To:              John Hannon/DC/USEPA/US@EPA, Carol Holmes/DC/USEPA/US@EPA  
Cc:              Dina Kruger/DC/USEPA/US@EPA, Rona Birnbaum/DC/USEPA/US@EPA, Suzanne  
                    Kocchi/DC/USEPA/US@EPA, Lesley Jantarasami/DC/USEPA/US@EPA, Ben  
                    DeAngelo/DC/USEPA/US@EPA  
Date:            12/05/2009 04:00 PM  
Subject:        Volume 1 for final OGC review

---

Hi John and Carol,

Here's all of Volume 1 for your review. Hopefully everything is solid by now, but please send me any final edits.

Note that the comment numbers are still off.

Thanks,  
Jeremy

[attachment "RTC draft Volume 1 General TSD Approach 12-5-09.doc" deleted by Carol Holmes/DC/USEPA/US]

EPA-3128

John Hannon/DC/USEPA/US

12/06/2009 06:18 PM

To Lesley Jantarasami

cc Rona Birnbaum

bcc

Subject Re: Vol 6 - forestry

Just a few edits. I copied one comment and response at the end that was in the last version I saw but was not here, so flagging it to make sure it get's handled. Thanks.

(b)(5) Deliberative

RTC draft Volume 6 Forestry Only 12-06-09 -jh1206.doc

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Phone (202) 564-5563  
Fax (202) 564-5603

Lesley Jantarasami Hi John, This latest version include... 12/06/2009 04:47:42 PM

From: Lesley Jantarasami/DC/USEPA/US  
To: John Hannon/DC/USEPA/US@EPA  
Cc: Rona Birnbaum/DC/USEPA/US@EPA  
Date: 12/06/2009 04:47 PM  
Subject: Vol 6 - forestry

---

Hi John,

This latest version includes Dina's edits. And thanks for your suggested language, you'll see we added it into one of the first big responses.

[attachment "RTC draft Volume 6 Forestry Only 12-06-09 .doc" deleted by John Hannon/DC/USEPA/US]

Lesley

EPA-EF-005318