ECCO Version 4 Release 2   **[https://dataverse.harvard.edu/dataverse/ECCOv4r2inputs]**   **[doi:10.7910/DVN/PICCRE]**

- This dataset (https://dx.doi.org/10.7910/DVN/PICCRE) provides documentation for the 'ECCO Version 4 Release 2 Inputs' dataverse (https://dataverse.harvard.edu/dataverse/ECCOv4r2inputs). The contents of this dataverse allow users to re-generate the ECCO V4 R2 solution, monthly output, and model-data comparisons (Forget et al. 2015, 2016) by running the MIT general circulation model (http://mitgcm.org/) and the included model setup (or http://mitgcm.org/viewvc/MITgcm/MITgcm_contrib/gael/verification/ECCO_v4_r2/) following the directions given in ECCOV4R2_userGuide.pdf (see https://dx.doi.org/10.7910/DVN/ODM2IQ).

- This dataset (https://dx.doi.org/10.7910/DVN/PICCRE) contains the following files:
  README.pdf   general documentation of the ECCO V4 R2 inputs dataverse (this file)
  c66a_eccov4r2.tar   ECCO V4 R2 model setup at the time of MITgcm checkpoint 66a

- The ECCO Version 4 Release 2 Inputs dataverse (https://dataverse.harvard.edu/dataverse/ECCOv4r2inputs) contains:

URL	Description
http://dx.doi.org/10.7910/DVN/PICCRE	documentation of the `ECCO Version 4 Release 2 Inputs' dataverse (this file)
http://dx.doi.org/10.7910/DVN/9WYSZF	ECCO version 4 release 2 inputs: surface forcing fields
http://dx.doi.org/10.7910/DVN/7XYXSF	ECCO version 4 release 2 inputs: model initialization
http://dx.doi.org/10.7910/DVN/GNOREE	ECCO version 4 release 2 inputs: in situ T-S profiles
http://dx.doi.org/10.7910/DVN/MEDQWY	ECCO version 4 release 2 inputs: sea level anomaly
http://dx.doi.org/10.7910/DVN/L3OQT0	ECCO version 4 release 2 inputs: sea surface temperature
http://dx.doi.org/10.7910/DVN/DKXQHO	ECCO version 4 release 2 inputs: ice cover fraction
http://dx.doi.org/10.7910/DVN/F8BCRF	ECCO version 4 release 2 inputs: surface wind stress
http://dx.doi.org/10.7910/DVN/SYZMUX	ECCO version 4 release 2 inputs: bottom pressure
http://dx.doi.org/10.7910/DVN/H2Q1ND	ECCO version 4 release 2 inputs: miscellaneous

- Comments:
- Each dataset listed above contains its own README file that provides more specific and detailed documentation.
- 'ECCO Version 4 Release 2' is a global ocean state estimate that covers the period from 1992 to 2011 (Forget et al. 2015, 2016). It was produced on behalf of the ECCO consortium (http://ecco-group.org/) with major support provided NASA's Physical Oceanography Program. General documentation of the 'ECCO Version 4 Release 2' dataverse and all included datasets can be found at https://dx.doi.org/10.7910/DVN/ODM2IQ (see README.pdf in that dataset).
- The formatting, online publishing, and archiving of the ECCO V4 R2 dataverse and datasets have benefited from guidance that was graciously provided by the MIT Libraries Data Management Services (http://libraries.mit.edu/data-management/). At time of writing the contents listed above can alternatively be downloaded from ftp://mit.ecco-group.org/ecco_for_las/version_4/release2/.

- References:
- Forget, G., J.-M. Campin, P. Heimbach, C. N. Hill, R. M. Ponte, and C. Wunsch, 2015: ECCO version 4: an integrated framework for non-linear inverse modeling and global ocean state estimation. Geoscientific Model Development, 8, 3071-3104, http://dx.doi.org/10.5194/gmd-8-3071-2015
- Forget, G., J.-M. Campin, P. Heimbach, C. N. Hill, R. M. Ponte, and C. Wunsch, 2016: ECCO Version 4: Second Release, http://hdl.handle.net/1721.1/102062

- Software:
- The ECCO V4 R2 files were produced using the `checkpoint64u' versions of the general circulation model (MITgcm and ECCO v4 settings) and Matlab analysis toolboxes (gcmfaces and MITprof). These software versions are available at http://mitgcm.org/download/other_checkpoints/ and http://mit.ecco-group.org/opendap/ecco_for_las/version_4/checkpoints/contents.html
- The up to date software documentations are available at http://mitgcm.org/public/r2_manual/latest/online_documents/manual.pdf, http://mitgcm.org/viewvc/*checkout*/MITgcm/MITgcm_contrib/gael/verification/eccov4.pdf, and http://mitgcm.org/viewvc/*checkout*/MITgcm/MITgcm_contrib/gael/matlab_class/gcmfaces.pdf

- Contact Us:
- questions regarding the ECCO model set-up, grid, software, or files should be addressed to either ecco-support@mit.edu (please subscribe via http://mailman.mit.edu/mailman/listinfo/ecco-support) or mitgcm-support@mitgcm.org more generally (please subscribe via http://mitgcm.org/mailman/listinfo/mitgcm-support).

- README file revision history:
- add c66a_eccov4r2.tar frozen copy of model setup   [Gael Forget] [2016/12/07]
- README file overhaul for use within dataverse   [Gael Forget] [2016/08/03]