SCIAMACHY Product handbook maintenance

Bremen, 15.06.2016

Universität Bremen

weigel@iup.physik.uni-bremen.de

Outline

1) Update procedure

2) Using the wiki

3) What needs to be updated?

4) Who needs to update what?

5) Schedule

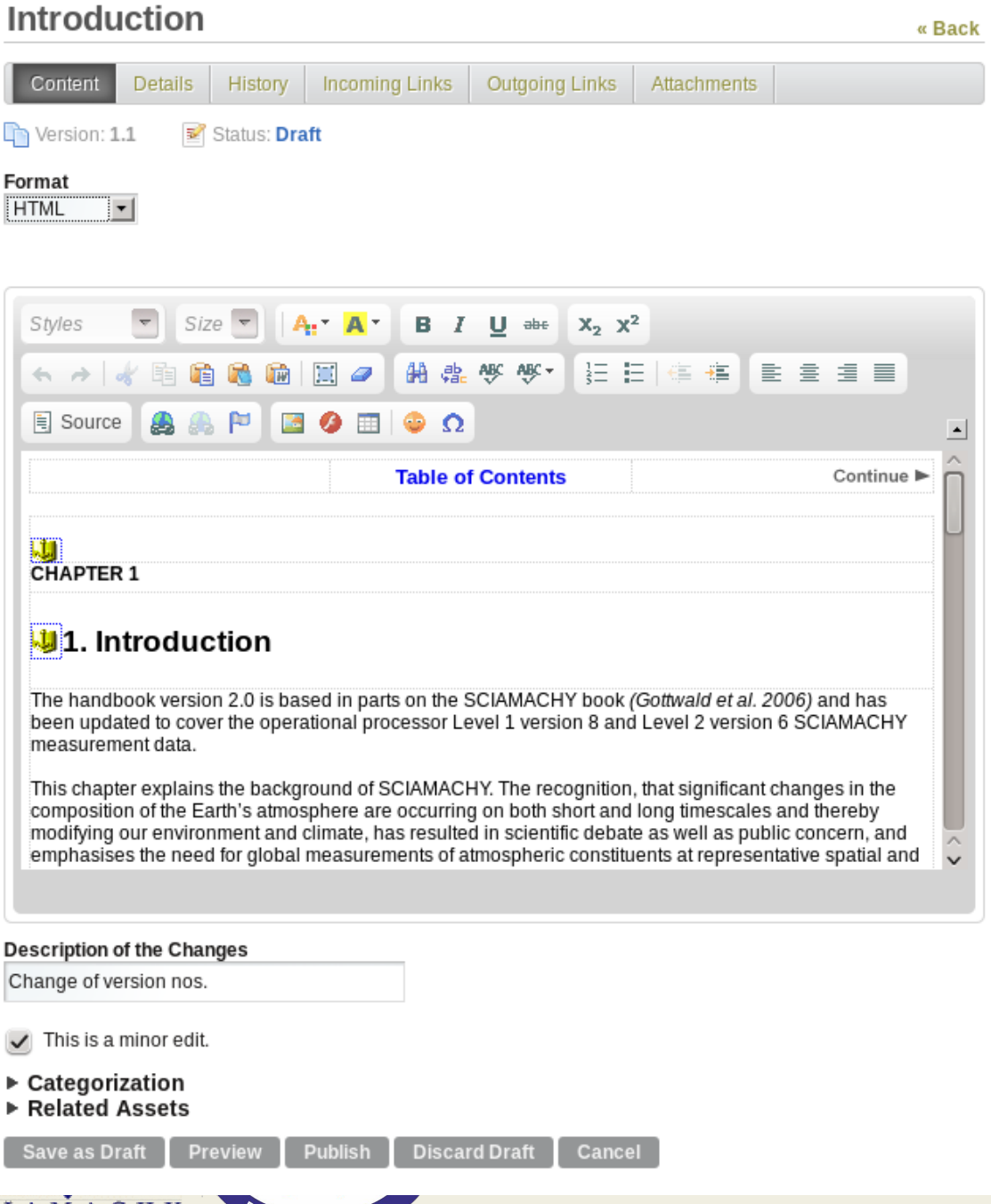
Universität Bremen
weigel@iup.physik.uni-bremen.de

1) Update procedure

- **Log in**
  - Get a login for ESA Earth Observation at: https://eo-sso-idp.eo.esa.int/idp/AuthnEngine
  - Inform Gabriele to get editing rights for the handbook copy
- **Handbook copy**
  - Not public visible copy of the handbook: https://earth.esa.int/web/guest/sciamachy-handbook-version-2
  - Will replace the current version after the update
  - Advantage: we can "publish" the changes and use complete functionality of the wiki
  - The style of the copy (yellow titles) is different to the public visible version (blue titles) to better distinguish them and will be adjusted after the update
  - Take care if there are blue titles somewhere, there are still some wrong links leading to the public version
- **Alternative**
  - If you don't want to get a login, send me the changes with respect to the public visible version of the handbook at: https://earth.esa.int/web/guest/missions/esa-operational-eo-missions/envisat/instruments/sciamachy-handbook/wiki

2) Using the wiki

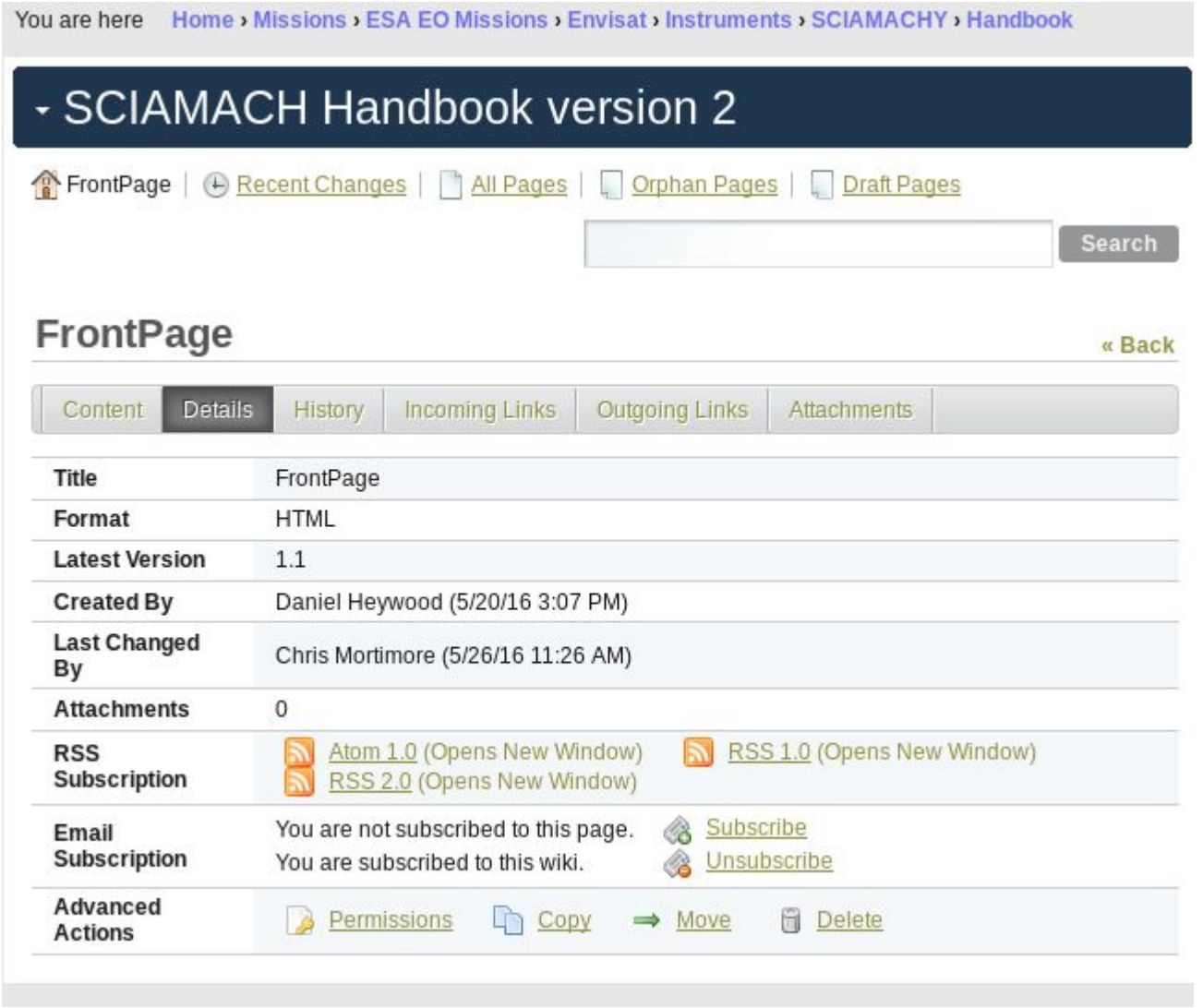
- **Edit**
  - Brings you to an online editor to edit the page
  - "Source" allows to edit the html code
  - "Publish" saves your changes and makes them visible to everybody



Universität Bremen
weigel@iup.physik.uni-bremen.de

2) Using the wiki

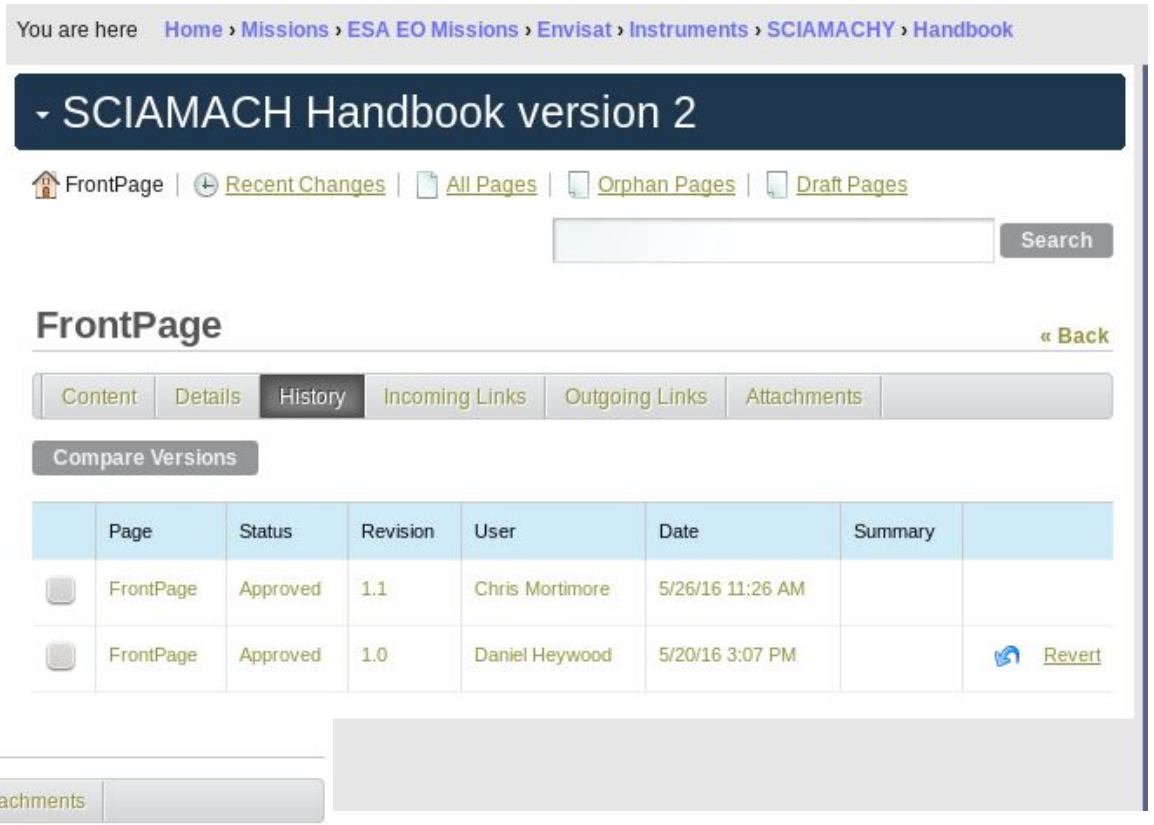
- **Details**
  - Here you can subscribe to pages to be informed by email if anybody edits them

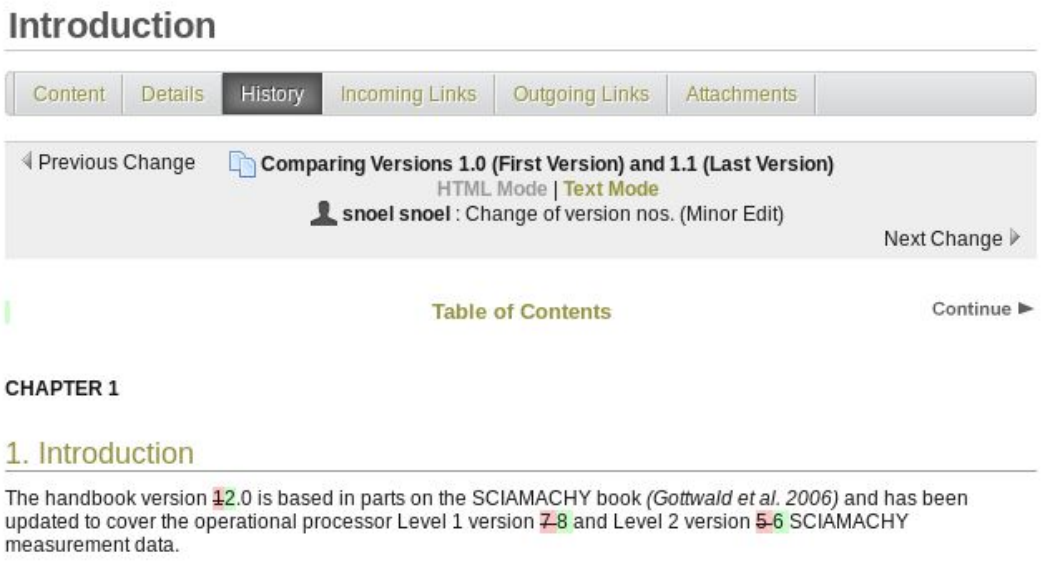


Universität Bremen
weigel@iup.physik.uni-bremen.de

2) Using the wiki

- **History**
  - Find and compare different versions
  - Revert changes





3) What needs to be updated?

- **Content**
  - Change from L1V8/L2V6 to L1V9/L2V7
  - Replace outdated figures and update text where necessary
  - Check links, references, ...
- **Formatting**
  - The wiki is based on the printed SCIAMACHY handbook
  - The way it was created leads to a structure which is still based on the original printed pages and not on chapters or sections
  - Suggestion: Pages are ok, but sections should not be split over two pages if possible
  - The numbering of sections and subsections is inconsistent between different chapters
- **What to do first?**
  - Formatting: the advantages would be that
    - It would make easier to find the content to change
    - Before everything for L1V9/L2V7 is decided we cannot start with all content changes
  - Content: the advantage would be that the content change would start from the same structure as the public visible version

3) What needs to be updated?

- **Formatting**
  - The way it was created leads to a structure which is still based on the original printed pages and not on chapters or sections, see **Table_of_content.pdf**

Universität Bremen

weigel@iup.physik.uni-bremen.de

4) Who needs to update what?

- **Basically everybody can implement changes where necessary**
- **List from my email:**
  - Changes/ questions/ additions?
  - What happens if several people should update one chapter?

Chapter 1
General check [Katja Weigel, Stefan Noel]
Chapter 2
General check [Manfred Gottwald, Katja Weigel, Stefan Noel]
New chapter 2.5 "In-Orbit Operations and Performance 2002-2012"[Manfred Gottwald]
2.3.2 Polarization Measurement Device: IUP [Patricia Liebing]/SRON [Ralph Snel]
Chapter 3
Update figures, all, mainly [DLR, IUP, KNMI, + others]
Include Stratospheric Aerosol and H2O and Mesospheric metals?
[IUP Katja Weigel + others]
Scientific limb cloud product [IUP Patricia Liebing]
Include occultation data products? [Klaus Bramstedt, Stefan Noel]
Chapter 4
4.1.2 The scanner model approach [Klaus Bramstedt]
4.2 Detector Corrections - changes for channel 6+? [Günther Lichtenberg]
4.4 Stray Light [Günther Lichtenberg]
4.5 Polarisation [Klaus Bramstedt, Patricia Liebing, Günther Lichtenberg, Ralph Snel]
4.6 Radiometric Calibration [Klaus Bramstedt, Günther Lichtenberg, Ralph Snel]
4.7 Optical Throughput Monitoring [Klaus Bramstedt]
Chapter 5
5.4.2 Application of Inversion Theory to Limb Retrieval incl. Table 5-3 [DLR, IUP]
5.5.2 Limb/Nadir Matching [IUP Nabiz Rahpoe]
Chapter 6
6.1 Level 0 Products [DLR Manfred Gottwald]
6.2 Operational Level 1b Products and Algorithms [DLR Günther Lichtenberg]
6.2.2.2 Dead and Bad Pixel Mask [Ralph Snel]
6.2.2.7 Polarization Correction [Patricia Liebing, Stefan Noel, Günther Lichtenberg, Ralph Snel]
6.2.2.8 Radiometric Correction [Klaus Bramstedt, Günther Lichtenberg, Ralph Snel]
6.2.2.10 and 6.2.4 Degradation Correction [Klaus Bramstedt, Ralph Snel]
(fig 6-3 and 4-6 are identical?)
6.2.3 Relevant Auxiliary Data [Klaus Bramstedt]
6.2.6 Data Format Description [DLR Günther Lichtenberg, Manfred Gottwald]
6.2.7 Product Quality Information [DLR, IUP, ESA]
6.3 Operational Level 2 Products and Algorithms [DLR]
6.3.3.1 Ozone Profile [DLR, IUP]
6.3.3.4 Cloud flagging and top height [Kai-Uwe Eichmann,Sergei Gretschany]
6.3.5 Data Format Description [DLR Günther Lichtenberg, ESA]
6.3.6 Product Quality Information [BIRA, ESA]
6.3.7 Software Tools [ESA]

Tropsopheric NO2 and BrO need to be added to Chapter 6? [Christophe Lerot, Sergei Gretschany]
(There is something about tropospheric NO2 in Chapter 5.6.1)
Eventually some chapters mentioned above needs to be merged and some added.

Universität Bremen
weigel@iup.physik.uni-bremen.de

5) Schedule

- **Planed to finish the handbook in September 2016**
- **Is that to early?**
- **When will the baseline for L1V9/L2V7 be ready?**
- **Start with the update of the format or the content?**

5) Schedule

- **Planed to finish the handbook in September 2016**
- **Is that to early?**
- **When will the baseline for L1V9/L2V7 be ready?**
- **Start with the update of the format or the content?**

Thank you for your attention!

Universität Bremen
weigel@iup.physik.uni-bremen.de

Universität Bremen
weigel@iup.physik.uni-bremen.de