OUTLINE

• IGN and INASAN recent solutions
• Work done since last AWG (Washington DC)
  – Data
  – Models
  – Estimation strategy
• Future plans
IGN and INASAN developments

• Both using GIPSY-OASIS
• Basic assumptions
  – Use different models when possible
  – Provide results of similar quality
• Recent solutions
  – IGN: ignwd13 (complete) + ignwd15 (complete)
  – INASAN: inawd08 (in progress)
NB: INASAN inawd08 will be complete by the end of the week
### Solutions characteristics

<table>
<thead>
<tr>
<th>solution</th>
<th>ignwd13</th>
<th>inawd08</th>
<th>ignwd15</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gravity field</td>
<td>EIGEN-06S2</td>
<td>GOCO02S</td>
<td>EIGEN-06S2</td>
</tr>
<tr>
<td>Gravity field degree</td>
<td>200</td>
<td>120</td>
<td>200</td>
</tr>
<tr>
<td>Mapping function</td>
<td>VMF-1</td>
<td>GMF</td>
<td>VMF-1</td>
</tr>
<tr>
<td>Elevation cutoff</td>
<td>7 degrees</td>
<td>12 degrees</td>
<td>7 degrees</td>
</tr>
<tr>
<td>Satellites</td>
<td>All available</td>
<td>All available but HY2A and Saral</td>
<td>All available</td>
</tr>
<tr>
<td>Phase Law correction</td>
<td>No</td>
<td>No</td>
<td>Yes</td>
</tr>
</tbody>
</table>
Remaining problems and open issues

• ignwd15: old data set used for SPOT4 in 1998
  – Problem in TZ (see Willis et al., J. Geod., 2006)
    (resubmission in progress)
• ignwd15: no systematic check for some satellite models (drag coefficient, solar radiation coefficient)
• ignwd15: estimation strategy could be improved
  (less opr parameters –see Stepanek-, no tropospheric horizontal gradient)
Conclusions

• ignwd13 and ignwd15 submitted. The only difference is the use of the Phase Law corrections → possible tests
• Potential interest to do a new solution (ignwd16) of time permits
• Need to upload solution + derived products at CDDIS + IGN data center
• Need to restart automated data processing with the new options (latest solution only)