Struve Arc 150

From 25 to 28 September 2002 the Association of Estonian Surveyors, Estonian Land Board, Estonian Agricultural University and Tartu University held a conference in Tallinn and Tartu on "Struve Arc 150". 50 delegates from 10 countries attended-namely Norway, Sweden, Finland, Russia, Estonia, Latvia, Lithuania, Belarus, Ukraine, Moldova, Belgium and UK. Essentially it was commemorating the 150th anniversary of the completion of the Struve Geodetic Arc that ran from near North Cape in Norway to the Black Sea, but was an ideal opportunity to discuss the arc in detail and to progress the efforts of the International Institution for the History of Surveying & Measurement to have selected points in each country recognised by UNESCO as a World Heritage Monument.

13 of the 15 technical papers were published in a special booklet. In addition to the technical presentations the group visited the remaining Struve survey stations marking the terminals of the Simuna baseline and the starting point of the whole arc in Tartu (formerly Dorpat) observatory. At the latter point the Rector of Tartu University, Professor Jaak Aaviksoo, unveiled a special plaque at the point set by Struve on the meridian through the observatory.

Four resolutions were passed, of which the following two were the most important:-

Resolution No. 1.

Following Resolution No. 1 from the International Scientific Conference held in Tartu in August 1993 and resolution No. 1 of FIG, Melbourne Congress in 1994 the participants in the International Scientific Conference held in Tallinn and Tartu, Estonia, on September 26-28 2002 to honour the scientific achievements of F.G.W.Struve,

considering the scientific, historical and practical importance of the measurement of the arc of meridian through Tartu which stretches from near North Cape in Norway, through Sweden, Finland, Russia, Estonia, Latvia, Lithuania, Belarus, Ukraine and Moldova to the Danube Delta made under the guidance of F.G.W.Struve,

urge the authorities in the 10 countries through which the Struve arc passes, to complete the preservation of the arc of meridian and the documentation in their countries as soon as possible, so that in their turn the national representatives to UNESCO may be urged to put them on their national provisional list of World Heritage Monuments.

Resolution No. 4

The participants in the International Scientific Conference held in Tallinn and Tartu, Estonia, on September 26-28 2002 to honour the scientific achievements of F.G.W.Struve,

considering the historical importance of the measurement of meridian arcs encourage the International Institution for the History of Surveying & Measurement to continue its investigation into the connection between the Struve Meridian Arc and the Arc of the 30th Meridian in East Africa,

urge the authorities of those countries concerned to assist in all ways they can to preserve selected points in their countries so that it is possible to achieve the aim of a World Heritage Monument stretching from near the North Cape of Norway at latitude 70° 40'11" N to latitude 33° 59'32" S in South Africa, making it the longest monument in the world.

Any reader interested to be involved in the activities mentioned above or who can supply information should in the first instance contact

Jim Smith on e-mail 101765.332@compuserve.com

On the morning of 29 September a wide-ranging discussion about aspects of the Struve Arc took place in the offices of Jüri Pärtna, Chairman of the board of Geomark. Others in attendance were:- Jan de Graeve (Belgium), Vitali Kaptjug (Russia), Pekka Tätilä (Finland) and Jim Smith (UK).

It was agreed:

- 1. To circulate copies of further UNESCO documents, including a sample submission for one point, together with notes on specific aspects of the submission.
- 2. Where recovered points were of doubtful position (e.g. the west end of the Simuna baseline) it was suggested that efforts should be made to refer back to the original field books for that point.
- 3. It was suggested that tourist information should be put on a board a little way from the actual point rather than actually on it. e.g. the East end of the Simuna baseline.
- 4. How the "ideal board" might look was discussed. It was suggested that the board might contain the following items in a vertical layout:-

UNESCO LOGO (when agreement achieved)

Struve Arc LOGO (to be designed)

Details in (a) either French or English (UNESCO requirement)

and (b) the local language

giving name, latitude, longitude, description etc. date observed.

Local history note (Optional)

- 5. Reiterated that each country MUST approach its national UNESCO representative as soon as possible to ensure that Struve points are on the national provisional list. EACH country to write its own reasons for the importance of each point.
- 6. Discussed the three points visited on 28 Sept. 2002 and agreed that all three should be put on the preservation list.
- 7. ALL relevant information (including maps at different scales, diagrams, photographs, coordinates etc) and the document to be signed by the National UNESCO representative to be obtained for each point, to Jim Smith or Pekka Tätilä by 1 July 2003
- 8. Jim Smith and Pekka Tätilä will agree a standard format for submission to simplify the compilation work.

Timetable.

October 2002 Each country contact its National UNESCO representative 1 July 2003 All documents and forms to Jim Smith or Pekka Tätilä

July-Sept 2003 Documents checked for completeness

11-14 Sept 2003 Meeting in Belarus

15 Sept-1 Nov. 2003 Any required modifications, extra material etc requested to be obtained and submitted

1 Nov 2003-1 Jan 2004 Pekka Tätilä and National Land Survey of Finland to compile and print final document

by 1 Feb 2004. Copies to be deposited with UNESCO in Paris.