By its nature this report will contain some criticism of the organisation, in all cases we have tried to be scrupulously objective with the sole intention of helping future championships to learn from the experience of this competition. We are very conscious of the fact that the organisation is staffed by volunteers who have given up countless hours of their free time and holidays to organise and run this competition and make it a success. Without their contribution the competition would not have been possible.

1. Organisation
   1.1 Overall Organisation: Core operations of gridding, task setting, launching and scoring were efficient and well managed. The peripheral social activity after flying had finished was generally muted and somewhat disappointing for a WGC.
   1.2 Quality of Officials: The Directors and department heads were knowledgeable people who knew their jobs and discharged their responsibilities in a friendly and efficient manner.
   1.3 Experience of Officials: The key officials were experienced in their jobs.
   1.4 Suitability of meetings and briefings: All daily briefings were held on schedule. The content complied with requirements and the presentation was clear and concise. Team Captains meetings were called in good time and run according to an agenda. Minutes were kept and circulated to Team Captains to confirm the outcome. The only exception was an urgent meeting that was called on the grid. The meeting started slightly ahead of the scheduled time and was not adequately controlled to ensure that the content was fully understood by all teams. This led to a protest.
   1.5 Suitability of weather information: Weather briefing provided pilots with a basic prognosis in tabular form supported by a large scale synoptic chart and occasionally by a local ascent.
   1.6 Suitability of facilities.
      1.6.1 Airfield: A Grass surface that became unusable for a day after heavy rain. It was just long enough for a safe takeoff. Consequently it was necessary to arrange the grid as close as possible to the downwind boundary, this was a complicated and sometimes frustrating operation for the crews and the organisers marshall. There were no areas immediately beyond the ends of the runway for a safe landing in the event of a failed take off. In south and south-westerly winds the airfield is downwind of a large lake that suppressed thermal activity in the drop zone and the area leading to the start lines. This resulted in large gaggles forming in these areas.
1.6.2 Briefing Hall: Entirely adequate. Excellent projection facilities with two projectors and screens that were clearly visible to everyone at the briefing. The sound system was good. Stage was high enough for the presenters to be easily visible to all members of audience. Always clean and well organised.

1.6.3 Water Ballast: Adequate but not ideal. The primary water supply was positioned near the main trailer park and tie down area. It was congested at peak times and muddy. Northerly tie down area did not have a direct supply of water.

1.6.4 Restaurant and Shops: The restaurant was situated in the hangar between the admin offices and the briefing room looking out over the airfield. A large tent had been added to give a protected eating area and there were tables and benches outside. During the cold weather in the practice period the restaurant in the hangar was drafty and cold and did not encourage evening socialising. For the first week of the championships the walls were decorated with local art works that lifted the rather drab atmosphere, but these were not there for the second week of the championships. The food was wholesome, but during peak times there were long queues. There was a sales counter in the registration office for a variety of gliding ware.

1.6.5 Admin Offices, Registration and press room: The offices were situated in a hangar that was in close proximity to the restaurant and briefing hall. There were sufficient computers with internet connection for public and press use.

1.6.6 Communications and PR: There seemed to be little awareness of the WGC in Eskilstuna itself and as an example there were no signs to direct visitors to the airfield or to advertise the WGC. No printed program was produced for the WGC so it was difficult to identify who was who. No daily news bulletin (see comments on web site) was printed. Pilots were given a customised map, but there no other complimentary or promotional items. On a daily basis results were sent to local and national broadcasters and publishers. We were advised that television footage of the event was broadcast on regional television and local newspapers carried articles on most days. At the end of the competition a full set of results with pictures of the winners was given to each competitor. It should be noted that the last week of the competition overlapped the start of World Cup Soccer that dominated all forms of news media.

1.6.7 Internet and Web Site: The area in and around the club house and camp site was served by a wireless network. Initially this did not have the capacity to cope with the
number of users. The system was upgraded during the first week of the championship. The Website was used as the primary communication channel for communicating with teams and was backed up with SMS information messages to team managers and officials. Web updates were made on a regular basis and the website reflected the activity and mood of the competition but lacked any in depth articles such as interviews with daily winners or the weather situation. The SMS message system was a clever idea, but was not reliable enough to be relied on. The scoring system output updated scores to the website as new flight records came in. The site received some 250,000 hits a day and up to the last day of the Championships 90 Giga bytes of information had been downloaded.

1.6.8 Camp Site and Toilet and Shower Facilities: During the practice week there was no hot water in one of the male shower blocks and there were not enough toilets in the area. There were numerous complaints. The situation improved during the first week of the Championships when a new water heater was installed. Additional portable toilets were installed. Even so, there were not enough male showers and at peak times campers could wait up to an hour for a shower. The layout of the camp site and the amount of space for the various teams was very good, as was the power supply to caravans. However there was no were no hosepipes in the caravan park and water for caravan reservoirs had to be brought to the caravan in containers.

1.6.9 Team Offices: Teams were not supplied with team offices and had to use their caravans as an alternative. Consequently team head quarters were spread out around the campsite and airfield. This sometimes made communication with teams difficult and discouraged inter-team socialising.

1.6.10 Technical Inspection: Efficient and well organised.

1.6.11 Pilot Registration: All pilot information was committed to a computerised data base and the registration process was efficient and friendly.

1.7 Transportation: Where required Jury and Stewards were collected from the local airports on their arrival in Sweden. With the exception of the Jury President all other IGC officials were housed in caravans on the airfield. At their request Stewards were provided with bicycles for transport on the airfield, and cars were available on a pool basis.

1.8 Information dissemination: See paragraph 1.6.7 in this report.

1.9 Pilot Assistance: We are not aware of any situations where help was not provided to pilots.

1.10 Retrieval: On reporting out landings crews were provided with computerised route maps to direct them to their pilot. To our
knowledge there have been no especially long or difficult retrieves. In one instance pilots did not contact the owner of the field where a group of gliders landed and the farmer later complained to the organisers.

1.11 Launch control for fair access and efficiency: All competitors had fair access to a launch, see paragraph 2.5.4 in this report. Sniffers were used to check soaring conditions prior to launching the first class and as a consequence there were very few relights even on the difficult days when soaring conditions were marginal. Relights were handled according to the rules and a mobile scale was available in the event that a competitor need to re-water his glider.

1.12 Opening and closing ceremonies including presentation of Jury and Stewards:

1.12.1 Opening Ceremony: The opening ceremony was conducted at the airfield. Competing teams were assembled in front of the VIPs and public and there was a local band. The speeches were all short. After the ceremony was over there was an air display featuring the historic gliders operated by the club as well as modern gliders, model aircraft and parachutists.

1.12.2 Jury and Stewards were introduced at the briefings during the practice period.

1.12.3 Closing Ceremony: Complied with all FAI requirements and suitably honoured the winning pilots and teams.

1.13 Other Social events: There were three National parties hosted by the Swedish, Italian and a combined German/Dutch team. In addition there were a number of evening presentations in the briefing hall. The organisers also hosted an excellent closing dinner and informal prize giving that was very entertaining.

1.14 Total number of scheduled days was 13 of which there were 10 contest days.

1.15 Media Liaison: See paragraph 1.6.6 in this report.

1.16 Tracking system: The VPos tracking system was used. 20 units were supplied to the organisers including a technical support specialist. During the first few competition days there was a relatively high unit failure rate and as a consequence coverage was intermittent and the system did not convey a coherent picture of the race. This improved towards the end of the competition when it provided some exciting viewing. PA system and commentary by Roland Stuck was a very valuable addition to the presentation, but was only available during the last few days of the competition.

1.17 Other organisational comment: There was a remoteness about the social and PR atmosphere of the competition and it lacked the feel of a World Championships. There were no suitable facilities for OSTIV meetings on the airfield and with a few exceptions these were held in a local hotel.

2 Rules.

2.1 Adequacy of the Local Procedures: These were approved by the IGC Bureau in good time and fulfilled their requirements.

2.2 Addendums or changes: None were required.
2.3 Fair application of Rules and Local Procedures: All rules were applied fairly.

2.4 Possible improvement of Rules and/or Local Procedures.

2.4.1 Annex A

2.4.1.1 Para 4.3.2. Rule should be reworded as a significant number of gliders do not comply, and the rule is not enforced during the technical inspection.

2.4.1.2 Para 8.1 Penalties. Include 18m and Club Class in wing span measurements.

2.4.1.3 Para 7.4.6 New Starts. The guidance note is incorrect and must be rewritten or removed.

2.4.1.4 Define a “non flying rest day”.

2.4.1.5 Suggested changes to Annex A to tidy up the definition of a competition launch. Suggested inserts are in italics and deleted sections in brackets. Para 7.2.2b “A competitor landing outside the contest site boundaries after a (regular) valid competition launch shall not…” Para 7.3.1b “If a pilot postpones his first launch on his own initiative, or he is not ready when his turn comes, he shall lose that launch and be deemed to have been given a launch opportunity in terms of 8.2.1.a.” Para 7.3.1.d Replace the words “official Launch” with the words “valid competition launch” in two places in this paragraph. Para 8.2.1 a “A launch opportunity, a valid competition launch, shall have ……”

2.5 Task Setting and operations.

2.5.1 Task setting: Weather briefing and task setting were done by the Championship Deputy Director in cooperation with Championship Director. A weather analysis was prepared each morning by two professional meteorologists on the basis of data available from SMHI, supported by information available on Internet. Tasks were set in accordance with the Sporting Code and the Local Rules, using a dedicated start point for each class.

2.5.2 Daily weight Checks: During the scrutineering process the max main wheel tow out weight was determined and all gliders were weighed on one of four weigh bridges on their way to the grid. Over weight gliders were required to dump ballast and no penalties were applied. The system worked smoothly and only a minority of gliders were found over weight and required to dump ballast.

2.5.3 Briefings: Briefings were held every day, except the non flying rest day. Administrative, operational and
safety related information were given as appropriate, in addition to a weather briefing. All the information was given in good English, supported by slides.

2.5.4 Launching: There were 12 Piper PA-25 Pawnee tow planes, fitted with electric rope winches. The number of tow planes was adequate and the launching was efficient and took between 75 and 85 minutes to complete. The tug pilots and the marshaling crews were experienced and the launching procedures were performed in a safe and efficient manner.

2.5.5 Finishes: A fixed 1,000 m. long straight line was used in accordance with the Local Procedures. When there were a number of gliders finishing at about the same time there were potentially dangerous situations and the pilots did well to avoid any incidents.

2.6 Scoring System (use and application).
2.6.1 System. SeeYou Competition was used for flight evaluations and scoring. A member of the SeeYou team was at the competition site for the first few days of the competition in case there were any problems. Random checks were conducted on daily scores, which were shown to be correct. Flight records were delivered to the scoring office via the internet and while the system worked, the delivery was sometimes delayed by internet congestion. This meant that the organisers did not control the download process. We also note that this remote process deprives the pilots of meeting while they hand their FR’s into control. SeeYou automatically validates the FR record as soon as it is received and the results were continually updated and displayed on the web site. There were no permanent displays to show the results in the restaurant or the control areas, but when the tracking display was finished, the projector was occasionally used to display results. Preliminary results based on the manual finish times were produced on “an occasional basis” and posted on the notice board. These could only be produced for racing tasks but we are of the opinion that they are an important and necessary feature of competition organisation. It was the reluctance of the scoring team to log the actual finish times and to enter them into SeeYou that was the problem.

2.6.2 FR’s. All FR’s were IGC approved and had current calibration certificates. GNSS satellite coverage was unbroken in the contest area. There were a minimal number of FR failures, but some timing problems with Zander FR’s were discovered. The flight records were sent to GFAC for analysis and comment. Errors as a result of the problem were corrected using data from secondary loggers. The scoring team must be
complimented for the attention to detail and for the effort in tracking down and identifying the problem.

2.7 Complaints and Protests: One protest was launched and the Jury ruled in favour of the contest director. The details of the protest can be found in the Jury’s report.

3 Safety.

3.1 General safety of the event: There was a Safety and Emergency plan that complied with FAI guidelines. The Safety committee was instated at the Opening Briefing on the first competition day. The members of the committee were Arne Boje Moller Std, Patrick Stouffs 18m, Garry Ittner 15m, Antti Lehto open and Dick Bradley as the Stewards Rep. The Operations Director Sakari Havbrandt took a very proactive and professional approach to managing the safety of the entire event. However there were many complaints from competitors about flight safety in gagglies before the start and the reckless and aggressive behaviour of some pilots. Despite changes to drop zones and start points designed to reduce this problem there were still complaints. During mass finishes there was considerable congestion in the circuit and landing areas, but pilots successfully avoided any serious incidents. Judged on the number of incidents reported, and the general level of background comment during the competition, competitors considered that the risk factors during this competition were higher than previous WGC. However we think that the emphasis on safety and the role of the safety committee have brought the pilots discussion about individual behaviour into the open and made reporting respectable. The high risk times were the gagglies before the starts and to some extent these were of the pilots own making. These were particularly bad on weak, low, blue days and the individual would not start alone and would wait for a “collective decision” from the gaggle before starting.

3.2 Occurrence of incidents and/or accidents: There were no accidents, but many individual incidents of reckless and aggressive behaviour in thermals were reported to the safety committee. Where specific gliders were mentioned the flight records were examined to establish the facts. Several pilots were called to the committee to review the flight records of the incidents and in more general cases pilots were spoken to by the Chief Steward and another member of the Safety Committee on an individual basis. The Chief Steward gave a short safety talk at two briefings that was reinforced by other safety lectures by the Operations director. The gagglings associated with the weak, low, dry thermals in the area around the start lines created an unsafe environment and this was largely responsible for the number of reports that were received.

3.3 Availability of Medical Personnel: The Chief Scorer was a medical doctor and was available on the airfield in case of emergency. We think however that it would be wise to have dedicated emergency personnel on the airfield at least during the period of the launch and finish.

3.4 Launch Safety: Pawnee tugs were used exclusively. Gliders were launched safely but there were no safety margins on takeoff.
3.5 Grid Safety: Generally safe and marshals managed spectators and crews well. There was however considerable risk associated with self launching gliders when they started their engines. Procedures were developed by the organisers to minimise this risk.

3.6 Pilots Skill relating to safety: A very high level of handling skill was obvious however judging by the number of complaints reckless and aggressive behaviour in thermals, attitude is a serious problem.

3.7 Suggestions for future safety enhancements.

3.7.1 To be effective in preventing problems in a competition organisation it is important that the CS be at the pre-worlds

3.7.2 The physical size of the site to accommodate the anticipated entry must be considered when a bid site is changed.

3.7.3 Airfields with airspace and other geographic constraints in the immediate vicinity of the site that prevent the separation of drop zones and start points between classes should not be used for large competitions.

Stewards Name:     Signature:

Stewards Name:     Signature:

Stewards Name: Dick Bradley     Signature: