IOI 2018 General Assembly Minutes

Tsukuba, Japan September 1-8, 2018 Convention Hall 300

GA Meeting 1 (Sunday 2 September, 13:15 – 14:00)
1. Welcome and Apologies

The President welcomed everyone, congratulated the organizers for their thorough preparation and that we can expect a great IOI2018.

2. GA Chair presented

The Chair of the GA will be Professor Katsuhiko Kakehi, who has been a long time president of the of the Japanese Committee for the IOI, the Chair of the ICPC board that organizes ACM ICPC regional contests in Japan, and is also the vice Chair of this Organizing Committee of IOI 2018 JAPAN. The Chair thanked the President for the introduction and stated that there was a large agenda.

3. Presentation and Confirmation of GA Agenda

With no objections, the agenda was approved.

4. Call for nominations

There will be two positions for IC, one position for ISC and one position for ITC this year. Nomination forms must be delivered to the secretary at the beginning of GA meeting 5. Presentations by candidates would take place in GA meeting 6, with voting in meeting GA 7.

5. Presentation of Code of Conduct (Ben Burton)

For the last three years we have been saying that the harassment of female students should stop. We have talked to the leaders, asking them to talk to the students, but unfortunately that hasn't worked. Wifi hotspots have been used to send messages where two female students were mentioned explicitly by countries; one was about having sex, another was about how hot a student was.

The purpose of the Code of Conduct is to make clear to everyone that harassment of anybody will not be permitted in the IOI. Ben requested leaders to again talk to their students.

The proposed Code of Conduct was displayed, and if accepted, would be incorporated into the regulations and procedures of the IOI. There would be potential consequences for violating the Code of Conduct as the regulations already state that contestants can be punished for actions outside the contest. Ben apologized to countries affected because, as a community, we have not been able to do more to halt the problems.

Two copies of the Code of Conduct have been printed and put in the pigeonholes, so leaders are asked to please show it to your students, talk to them, translate it if necessary and ensure students understand it.

Ben received applause.

6. Approval of Contest rules and procedures (Jakub Łącki, on behalf of ISC)
Only the changes introduced since last year were presented.

(a) In the February meeting the ISC decided to keep the ban on snacks on the contest floor because of the potential problems they introduce.

This policy was questioned and Jakub said ISC would check with the Host and this item will be discussed again later, as students bringing snacks to the contest hall would add to the checking time.

(b) Scores will be rounded to integers.

There was extensive discussion as to the rounding, the fairness of this approach and the best time at which to apply the rounding (as CMS could handle floating point scores) and whether minute differences in scores really evaluated students' skills.

Jakub had checked with the hosts and it is possible to change and use floating point scores. He says the proposal then is to use two digits precision this year. If it is in the Contest Rules it does not need to be in the task statements.

Proposal: Add two extra digits to the score precision for each task

Voting results: 42 in favour, 22 against, 7 abstentions.

(An Announcement: Due to technical problems, the Practice Session will start thirty minutes late.)

(c) The feedback sent to the contestants may be one of "Execution Killed", "Execution Failed", "Wrong Answer" and "Accepted", together with the number of points awarded. "Execution killed" means execution was killed by a signal, "Execution Failed" means the program finished with a non-zero return code. For tasks with partial scores the verdict will be "Accepted" if the output is correct, "Wrong Answer" if the output is not correct. This has been past practice for several years and now it is being put in the rules.

(d) Show live statistics to the contestants on the distribution of the points regarding the tasks. The main motivation of this feedback is to help the contestants to find the easier tasks. ISC discussed this issue at length, but most options were discarded because ISC wants the feedback to have an important property: that a single contestant may not influence the statistics that we show by a significant amount. There would be a coloured bar, one colour per task, and the size of the bar for each task is the percentage of total points awarded to the task, considering all contestants. In other words, out of all points scored by all contestants, x % were scored on task 1, y% on task 2, z % on task 3.

This is an experiment for this year, we will ask the usefulness of this feedback in the survey to the students. This is an important change, as in introduces some small interaction between contestants.

Discussion ensued: (Responses are in brackets)

- Why the average wasn't used? (students may decide to stop working on a task based on this value)
- Whether it had had a large size trial ?(Not in an actual contest but in a simulation)
- The motivation?(Student survey said they would like more feedback- to the question "would

it be useful to provide statistics to indicate the difficulty of (sub) tasks during the contest?" about 75% wanted more)
- Whether an ISC estimate of difficulty was better? (This could be subjective)
- The first solution alters the statistics enormously so there should be a delay, and several countries supported this suggestion
- that the it may cause a distraction to students

An Urgent point was made by the HTC Chair: they do not have time to change the system to display the feedback after some time delay, they will not have time to implement and test it. Similarly for changing the scores to two digits precision issue. Furthermore, the students will not have used it in Practice Session, as there is no time to implement it for Practice Session. If the GA approves the HTC have to do it, but regarding the rounding issue, they are simply following what has been done in the previous two years. If the GA asks the HTC to change these two points, it is very probable that we will not be able to do it.

William Di Luigi (ITC), says he was the implementer of the feedback feature and it can be enabled or disabled by checking a box, so we can enable it, for example, after one hour if required.

- Students won't know from this how they are faring (that isn't the purpose, its to help sort the tasks by difficulty, based on data) Offering this type of information was questioned. (the motivation is to make most of the contestants solve the tasks they were supposed to solve.
- It isn't tested, (several countries stated this) it's hard to understand and doesn't help weaker students and may lead a strong student to miss an easy question. (ISC believes this is helpful to the students and it is a good compromise between stress and help, although it is a trade off)
- Strong contestants may avoid submitting a difficult task earlier in the contest so as not to give information. (ISC believes that the number of points for easier sub-tasks will dominate the number of points for harder sub-tasks.)
- There is a large difference between a problem where everyone gets 20 points, and a task where twenty percent of the contestants gets 100 points, but they both give the same information so it is better to let the contestants use their instincts.
- . Can the GA see what the students will see (available at practice session)

Jakub suggested a trial at the Practice Session and take a vote after the session. This was approved.

(e) There is no Test interface this year, as the grader machines are identical to the contestant's machines so potential differences in execution times should be negligible.

A question was asked that if the contestant machine for some reason is slower, would that be accepted as an appeal? The answer was that here is no Test interface but the student can always submit to the real grading system.

7. Procedures for extending the contest. (Richard Peng)

In 2017 there was a very late extension of the contest. This issued was discussed extensively in the ISC, and they did not find a solution that would not involve a discriminatory step. Extending the system is a very important decision, and for this year extending the contest would be a decision by the HSC and ISC Chairs.

In terms of extensions due to issues with the machines, we have two useful guidelines: in the case

where relocation to a different machine would have solved the issue but we did not relocate, an extension would definitely be given. If a contestant believes they deserve an extension, he or she should not leave their place at the machine; the host will not remove contestants from their machines after the contest. As soon as a contestant leaves their place, or starts talking to other contestants, this forbids the concession of an extension. We are working on a system where the contestant can submit even if the network is down, but it is not ready yet for use. Instead, contestants should make a folder "I want to submit this" and copy his/her submissions to this folder, and remain at their seat, waiting the issue is resolved.

Richard also noted that leaders should remind contestants that due to the increase in load, they should not expect feedback in the last thirty minutes of contest.

Question: are students allowed to use non-common extensions available in the different programming languages. Martin replies that all language extensions, with the options published, can be used.

5. Approval of Contest rules and procedures (continued)
The food provided in the Contest Hall will be banana and jelly. The organisers also informed ISC that it will not be possible to allow students to bring their own snacks into the Contest Hall. Jakub apologised for misunderstanding last years' demand from the GA, and promised to change the Contest Rules for next year.

The vote to accept the contest rules is to be taken after the practice session.

GA Meeting 2 (Sunday 2 September, 16:00 – 17:30)

8. Issues arising from Practice Session (HTC)

- It took time to initialize the machines for some contestants, but the issue will be solved for Contest Day 1.
- Contestants wanted to bring mouse pads and it was announced during the Practice Session that this would be allowed, and they could bring them to the contest hall tomorrow, but should leave them there for Competition day 2.

Questions arose: (the HSC responses are in brackets)
- Will earplugs be allowed? (No)
- Some machines booted quickly and others took up to 10 minutes so can students boot and type their passwords only after the contest starts? (This issue will be solved, but students can be reading tasks)
- There were complaints of too many announcements using a very loud sound system. (This will only be used if necessary and most announcements will be via CMS)
- The rule of at most one submission per minute should not be active in the last fifteen minutes, but that did not happened in Practice Session. (It will be correct in the contest)
- There is no mouse and that should be clearly stated on the website
- One contestant received the wrong printout (This should not occur tomorrow)
- Auto-completion for C++ and Java is not working, would it be installed for tomorrow? (Yes).
- A contestant complained about some trouble with GDB on CodeBlocks but never got any answers, but towards the end of the session it seemed to work. (Didn’t have an answer but would check)
- The compiler flags were different on CMS and on the local file. (Will look at it.)
- The keyboard map for South American Spanish is not installed so the list of keyboard maps

should be published with the contest system information. (Note taken, and will look at it.)

9. Call for proposals for Group Discussions
Those who have ideas for themes for Group Discussions please contact the Secretary, so that we can organize a schedule for the Group Discussions.

10. Nomination of scrutineers

The Chair proposed that as usual the scrutineers are past IOI Chairs, of which we have four here: Krassimir Manev (IOI2009, Bulgaria), Troy Vasaga (IOI2010, Canada), Bakhyt Matkarimov (Kazakstan, 2015) and Mohamed Abam (Iran, 2017)
Approved

(Presentation of regulation changes deferred)

11. Returned to Partial Feedback (Richard Peng, Head of ISC)
There are two updates:

(a) After consultation with ITC and HTC, waiting for a period of one hour for making the feedback public is not doable at this point. The only alternative possible is to make exactly one announcement on CMS, at around half way to the contest, informing that at this point, the distribution looks like this.

Discussion:

- Is the vote only for this year or also for the coming years? (Only this)
- The survey question which was the motivation was perhaps too general
- It may mislead students into a poor contest strategy
- We don't really know the effect of this rule change/experimental/unfair to change the rules now

Voting on Feedback:
Having some form of this new feedback, live during the contest or one time only for the contest was 36 in favour, 30 against, 9 abstentions.

The type of feedback, live stats or only one announcement. 42 in favour of live stats, 22 in favour of one announcement, 13 abstentions.

Voting on Contest Rules:
Before voting it was announced that the host said it is not possible to change the rounding for this year. So we will do it for next year.

Discussion: The GA has to vote to approve the rules, yet the GA cannot change them. Thus the system appears to be "broken". A year's warning is needed so that in a flexible way we can make changes based on the wishes of the GA. This statement from Canada was applauded.

Martin commented that he thinks it is impossible to build a system in a way so flexible that seemingly minor changes the GA decides could be implemented just a day before the contest. That is the reason the Contest Rules are published weeks in advance, so that serious complaints can be made to the ISC or the IC, and be acted upon if necessary.

Jakub clarified that he may not have worded the Host position perfectly; it is theoretically possible to change the system, but changing it one day in advance is not what the Host expected, nor the way the Host operates, and they are extremely unwilling to change the way they operate for a change that most of us, I think, consider not super important for the contest.

While this is the correct technical decision, how the GA decides on the Contest Rules needs discussion. Maybe they should be voted on one year ahead; that is not something that needs to be decided today, but we should discuss it. (Canada)

Before voting on the rules, it was clarified that the only change was allowing mouse pads.

Approving the rules: 61 in favour, 0 against, 9 abstentions

GA Meeting 3 (Sunday 2 September, 20:00)

12. Task selection for Competition Day 1

The ISC presented the set of tasks for Day 1: Combo (author: Ammar Fathin Sabili, Indonesia), Seats (author: Mikhail Pyaderkin, Russia) and Werewolf (authors: Mohammad Roghani, Iran, and Helia Ziaei, Iran).
After some discussions and minor objections, the set was approved with 78 votes in favour, 0 against and 0 abstentions.

GA Meeting 4 (Monday 3 September, 18:00 - 19:30, 20:30 - 21:30)

Announcement by Greg Lee, President:
We had an issue last year, of having no bid for IOI 2021, and there was a risk that we wouldn't find a host for 2021. Thankfully, there is very good news.
Egypt submitted a bid and has been approved by the IC to host IOI 2021.
As a consequence, Egypt's current seat at the IC will expire, so there will be one extra available 1 year position for the IC during this year's election.

We were also supposed to select a host for 2022, and we received 1 bid. IC approved Indonesia for hosting IOI 2022.

All of you need to start thinking about hosting in 2023. Please put a bid as soon as possible if you're interested.

13. Report on Competition Day 1

Martin Mares (ITC) informed that the contest started 40 minutes late, not because of technical problems, but due to organisation problems, mainly the time for contestants to enter the contest floor.

At the end of the contest, one contestant asked for extra time because of network problems. ISC denied the request, based on the fact that the problem affected all contestants equally.

Minor problems during the contest:

- Fifteen contestants using CodeBlocks suffered a machine lockup; it was caused by an internal bug. Martin commented that CodeBlocks is not a good option for contests, due to its many bugs (all versions have some), and the suggestion to contestants who want to use CodeBlocks is to disable plugins, which seem to minimize problems.
- Three contestants had UI lockups (the pointer was moving but they could not click), caused by a buggy pointer grab by some app; it was solved by switching to console and back (the time lost was only a few minutes).

The clarification process is not well defined in the rules, and Martin asked leaders to inform contestants that clarifications can be done for two reasons: clarifications about tasks (yes/no question, can be done by CMS or on paper) and technical questions (for example machine crashes, can be done by CMS or by raising hands).

14. Appeals for Competition Day 1

Jakub Łącki (ISC) thanked everyone in ITC and HTC, as there was no problems or complaints about the graders, due to their hard work.

There was one appeal that answers received for two similar solutions submitted were different (timeout and wrong answer). ISC checked and both answers were correct. The difference in the reported answer is due to the way CMS works for subtasks. The two programs mentioned were doing very different things, so had different answers.

Two other appeals, were denied as the problems mentioned were common to all students (if they performed the same actions) and they had had time to submit whatever they wanted.

In one case, a contestant had code that he wanted to submit, but the computer froze. The issue was common to all the contestants, and this happened at least 10 minutes before the end, so the contestant still had time to submit. ISC considers that these are not grounds for accepting appeals.

Questions:

- Did ISC/ITC log how many times this happened to each contestant, and how much time the contestant lost? Martin Mares answered that in every case the machine was functional for the last 15 minutes of the contest. The first priority of ITC is always to fix the issue, so sometimes they don't have the exact timing. It was between 5 and 10 minutes for each issue. Some contestants say it happened to them three times, but the issue was uniform across all the machines.

- Was the problem due to the contestant's program using too much memory? Martin said that in all the cases investigated in detail, it was the program's fault. Not all cases were investigated, but the machines had 4GB of memory, so I'm almost sure that it was always caused by the contestant's program using too much memory.

ISC however regretted to inform that handling of the students' requests were not done correctly. The staff told the contestant that the request was rejected, but it should have gone through the ISC. Although the decision would be the same if the requests were treated correctly, ISC apologises for the error and will make sure all appeals are dealt with properly in Competition Day 2.

Questions:

- What is the best practice for the students who wish to ask for extra-time? Ali answered that students should follow the procedure explained in the practice: students should ask for extra time using CMS and they should not leave their machines until told so by a staff person. Also, to ask for extra time as early as possible.

The Chair informed the GA that a typhoon is heading towards Japan, but the forecast says that it will bypass this area. There will be some be rain tomorrow, but the excursion is confirmed, so remember to take a raincoat or an umbrella.

GA Meeting 5 (Tuesday 4 September, 18:00 - 19:30)
15. Task selection for Competition Day 2

The ISC presented the set of tasks for Day 2: Mechanical Doll (author: Tomasz Idziaszek, Poland), Highway Tolls (author: Shogo Murai, Japan) and Meetings (author: Riku Kawasaki, Japan). There were only minor objections, and the set was approved unanimously.

GA Meeting 6 (Wednesday 5 September, 18:00 - 19:00, 20:30 - 21:30)
16. Report on Competition Day 2

Martin Mares, on behalf of the ITC, informed that there were no major issues on Competition Day 2. Minor issues were:

- There was one case of a broken keyboard: the contestant was relocated and awarded four minutes of extra-time.
- One contestant claimed that the java compiler was producing wrong code, but was not able to reproduce the problem (neither was HTC).
- Another contestant rebooted his machine, but the time lost was small.
- One student complained that CodeBlocks crashed, but was not given extra-time, as leaders had been advised to warn contestants about CodeBlocks problems.

Martin then displayed some statistics.

- The Grader queue was empty four minutes after the end of Contest Day 2
- The maximum submission rate was 25 submissions/minute.
- Programming language usage, including all contestants, was C++: 332, Java: 7, Pascal: 1. Martin explained that the total is greater than the number of students because some contestants used multiple languages.

17. Appeals for Competition Day 2

(a) Clarifications (Jonathan Gunawan ,ISC)

- 18 minutes after the contest started, a contestant asked whether a solution always exists for the task Highway. ISC answered 'yes', and announced it to all contestants, since this could be considered a hint.

- Three contestants asked clarification on the scoring scheme for subtasks of task Mechanical Doll. The answer was also sent to all contestants.

- Three contestants asked about “Not correct” / “Accepted” displayed by the grader. If the score was too low, we displayed “Not correct”, which was really confusing. ISC answered only to students who asked. ISC was aware of this problem before the contest, but it was

difficult to make the changes to the system. Note is taken so that it does not happen again in future IOIs.

(b) Communication between HSC and ISC (Richard Peng, ISC)

Richard informed the GA of an issue that arose during the development of the task Mechanical Doll. In the February meeting the ISC selected this task but recommended that it should be made into an "output only" task. After working extensively on the development of the task, the HSC decided that it would be better not to follow the ISC recommendation. However, the ISC was aware that the recommendation had not been implemented only on 26th August. The options in the ISC point of view at that point were (i) change the task to output only or (ii) keep the format as a batch task but reduce the number of input files (five instead of ten), increase time and memory limits, and release the input files to contestants. The HSC, however, decided to keep the task as it was prepared, because it considered it would not be feasible to make all the necessary changes.

Richard wanted to make this report because he wanted it on record, he believes that these issues affect the effectiveness of the ISC and makes it difficult to "ensure continuity and quality control for IOI competitions". Richard said that he also believes it may help to enforce a better, closer communication between ISC and HSC in the future, and that he would be happy to discuss the problem further outside the GA.

(c) Live Statistics which were shown to the Contestants (Ali Zarchi)

Using the statistics displayed, at the beginning of the contest the tasks Meeting and Dolls seemed to be the best options. After two hours, contestants could see that Dolls seemed to be the best option. To assess if this information was useful to the students, Ali prepared several slides showing the distribution of scores for each task.

(d) Richard Peng informed the GA that there were no appeals for Day 2.

Questions
How many contestants competed? The official number of contestants is 335, the number of contestants on Competition Day 1. On Competition Day 2 there were 334 contestants.

18. Presentations by candidates for IC, ISC and ITC members

There were seven candidates for IC standing for three available positions: two three year positions, since Mile Jovanov and Kresimir Malnar are leaving, and one year position, as Eslam Wageed is transitioning from an elected member to a representative of Egypt, and his mandate as elected member has one more year.

The IC candidates are Benjamin Burton, Mile Jovanov, Eduards Kalinicenko, Kresimir Malnar, Krassimir Manev, Bakhyt Matkarimov, Hamid Zarrabi-Zadeh, Mowaffaq Hanadeh. The Chair announced that Krassimir Manev has withdrawn from the election. The other six candidates made a brief presentation each to the GA.

There were three ISC candidates for one position: Johan Sannemo, Ali Sharifi-Zarchi and Hasan Jaddouh, and they made a brief presentation to the GA. (Hasan Jaddouh was not able to attend the meeting).

There was one candidate for the ITC, Fredrik Niemela, standing for one position.

GA Meeting 7 (Friday 7 September, 09:00 - 13:00)

19. Confirmation of minutes of GA Meeting IOI2017

Latvia had some proposed corrections to the minutes, but as the minutes were not available before the IOI, asked what the procedure is to fix this now? The Chair proposed that we keep this for later and decide how to proceed, continuing with the other items in the agenda.

20. IOI President's report (Greg Lee)

The President informed the GA that a dear friend of the IOI community, Ries Kock, has passed away. Ries was the Chairman of IOI95, a member of IC for several mandates, leader and deputy leader for the Netherlands. He was still very active, and was still communicating about the IOI on the day he passed. The President asked Eljakim Schrijvers to pass our condolences to Ries' family on behalf of the IOI community.

The President announced that thanks to Egypt and Indonesia, we now have hosts for IOI 2021 and 2022.

Acer Sponsorship begins this year and extends to 2021, but he intends to talk to the Acer CEO to start negotiating an extension. He commented that he is also looking for new sponsorships to help potential future hosts. The IC has been having long discussions on how to ensure the future of the IOI, increasing the number of participating countries, but trying to lower the costs of hosting an IOI. One possibility discussed is to increase the value of the team participation fee; for now this is only one of the possible solutions, but if you have any suggestions or comments, please send it to me or to an IC member.

The President commented that one of the things he wanted to do during his term was to use IOI to promote K-12 education in programming and informatics, and said he plans to organize a workshop to discuss how to use competitions to promote CS K-12 education in our countries. There are already efforts in this direction in our community, and Bebras is a good example. The President says he hope we can work on this together, and would like to talk to anyone interested about this.

21. Secretary's report (Ricardo Anido)

The secretary reports that his job was mostly answering requests from countries and people. There were some requests from countries wanting to join IOI, but none that are really ready for consideration. The Secretary informed that there was a small issue with a competition that was using a name similar to IOI, but we negotiated and they kindly changed the name of the competition. There were also requests from some students who wanted to know how to participate, from countries already in our community, or in some cases not part of our community.

Questions:
Have the minutes for IC meetings Jul2017 and Feb2017 been approved, because they are not in the

website? Ricardo apologised, informed that they have been approved, and will ask for them to be put in the website.

22. Report from the ITC (Martin Mares)
The ITC did not do much at this IOI because the host preferred to do everything on their own. ITC helped to solve some minor problems, such as machine crashes and compiler errors, but in the end the result was excellent and the Host did a very good job.

However, Martin said the he would prefer the ITC and HTC would collaborate more in future IOIs, for this potentially can make finding a faster and better solution to problems arising during the competition, and would also help maintain continuity in the way issues are handled. He also commented that future hosts would benefit from a closer cooperation with the current HTC. Martin again congratulated the Host for the competition.

There are three ongoing projects: (i) improving the security of grading, separating the secured data from the address space of the contestants' code; (ii) providing a more efficient grading system for interactive tasks; and (iii) improving job queuing in CMS when there are many submissions and many grading workers.

Martin then commented on the other ITC responsibilities: help maintaining the software repository (https://github.com/ioi/), maintaining the technical checklist for Future Hosts updated (http://wiki.ioinformatics.org/wiki/HostingAnIOI), the ITC webpage, the IOI mailing lists (lists.ioinformatics.org), the IOI wiki, and internal systems for ISC and ITC.

Anyone with other technical issues is invited to contact him or some other ITC member.

23. Report from the ISC (Jonathan Gunawan)
The work done during the February meeting was described. The ISC selected nine tasks from the 56 submitted, and discussed the preparation of the tasks, including subtasks. ISC also discussed and decided on a procedure for time extension, explained during the presentation of the Competition Rules. ISC also discussed several approaches for giving contestants more feedback, and decided on the live statistics used during this year's contest.

At the IOI, the ISC helped HSC to run the contest. The ISC noted several issues to be discussed next year, for example live statistics, and how to deal with non-translating countries.

The official number of participants at this IOI was 335. Therefore, there will be 29 gold medals (336 points or more), 55 silver medals (272 points or more), 83 bronze medals (187 points or more).

24. HTC Report
HTC thanked everybody who contributed to the IOI, saying they appreciate their help very much and apologized for any troubles during the contest.

HTC also commented on some issues that might cause problems in future IOIs: some leaders did not come to the task presentation session, some leaders delivered translations that were not ready, some leaders did not come to the appeal session, and HTC cannot accept that, since leaders are supposed to be responsible for the contestants. Also, we require the leaders' signature when contestants bring their keyboard, but some leaders were not present. HTC suggests that the role of the leaders should be discussed in the future.

25. Announcement of selected proposals from Call for Projects (Mile Jovanov)

Mile said there had been the first call for projects, and although the process started late, it was completed. There was EU 8,000 in the budget and the IC received three proposals. The proposals were discussed with the authors and within the IC. "IOI in a box" was approved and was invited to describe the project.

Croatia explained that the idea for the project came from frustration with how hard it was to simulate past IOI contests for training new contestants. Since there is one comprehensive archive of IOI tasks on Yandex, the goal of the project "IOI in a box" is to make it easier to download and run a past IO contest in a docker container. This project is supported by IC and by the Croatian Computer Science Association.

Two other projects were submitted, "IOI museum" and "Code Park", but the IC felt the proposals were not yet ready, and have asked the authors to rewrite the projects and re-submit if they wish.

This year the IC will open the call for projects on September 15th with a deadline of December 15th. Then IC will have two months to communicate with the proposers, and will decide during the February meeting. Funding for approved projects will start from March. Although we recognize that some submissions may be for long-term projects, it would be great if the project could be completed before the next IOI, although that will not be a requirement. If that is not possible, IC will ask for a short status report during the IOI. This year, the IC allocated EU 6,000 for new projects.

The many talents within the IOI community should result in good project proposals.

26. Financial Statement for preceding year (Eljakim Schrijvers)

A copy of the financial statement was put in the pigeon holes. Kim presented the overview: the income was EU 16,500 in registration fees. IOI had also some sponsors, such as the company that redesigned the IOI website, estimated at EU 2,500, and the Japanese Host which sponsored the IOI broadcast. The total income was EU 23,931.00.

The Office of the IOI didn't have any expenses. There were expenses for Communication (live stream, statistics page, website), Development (journal, ITC, ISC funds, bringing Tim Bell for the IOI Conference), and Miscellaneous (website redesign, call for projects).

There were no questions about the Financial Report.

27. Budget for forthcoming financial year (Eljakim Schrijvers)

An overview was presented and Kim remarked on some items. In the income, we are expecting EU 2,500 sponsorship from the company that did the website design, as they are offering to maintain the website. We are also expecting higher costs for the Office of the IOI. Budgeted money for the Journal, ISC Fund, ITC Lab, The call for projects (EU 1,500 as the second instalment for the "IOI in a box" project, EU 6,000 for new projects).

Questions
How can we decide on the budget for next year when we have not decided on the value for the registration fee, which is the next item in the agenda. Kim answered that the money for the next year's budget is the fees paid on this IOI.

Vote to approve: There were no votes against and no abstentions, so the budget was approved.

28. Registration fee for IOI2019 (Eljakim Schrijvers)
As the value of the registration fee has been EU 200 for some years, it is suggested that we decide that it will be EU 200 from now on, so that we do not need to put this item on the agenda for the GA meeting of next year.

Vote that the value of registration next year is EU 200: approved unanimously.
Vote to not put this item on the agenda unless we want to change it: Approved with one vote against

29. Code of Conduct (Ben Burton)

(a) Ben thanked everyone who contributed by sending suggestions for the IOI Code of Conduct. This version has small changes from the version presented earlier: "races and color" is replaced by ethnicities, and the way photography is dealt with has changed.

Discussion

- The sanctions range from a warning to disqualification; can you give an example of something in between? Ben answers that the intention to allow some flexibility to the IC. The heaviest penalty the IC can apply is to disqualify the contestant. The lightest penalty is an IC member or representative to talk to the student.

- We could use other penalties such as colored cards or even financial. We could have a list of sanctions in the code, making clear the list is not exclusive. Ben reponded that the aim was to keep the Code short and let the IC, as your representatives, make the decisions. Our proposal is that if there is a grievance, it would be investigated by a group of trusted people outside of the IC, so that the IC would not know the country involved, so as not to be influenced when making the decision.

- We rarely meet cases when IC discusses this type of items. The repercussions are not well specified. Are there previous cases where we could have used this? Ben responded that he personally does not know, having spent only three years in the IC. He says he is not aware of a complaint where we were able to identify the perpetrator. The Code of Conduct is the IOI making a statement that this type of behaviour is not correct. Even if we cannot find the perpetrator, it is important to make such a statement. Ben says grievances of this type have happened in the past, as wifi hotspot names, but we could not find out who created them.

- Does disqualification include future IOI? Ben responded that it applies only to the current IOI.

- Maybe the Code of Conduct will just become fancy words, but we need to act. Leaders need to talk to their contestants. We should be careful also when choosing Future Hosts for the IOI. This is not the fault of the countries' representatives, but some countries have issues with people who are homosexual or have different religions. Last year, some contestants could not participate because of their sexual representation. We had countries where women were forced to wear a headscarf. I know it’s hard to find countries that will host an IOI but we should aim to hold the IOI in countries which respect this code of conduct. The President responded that we all strive for equality and we will do our best to ensure Future Hosts will ensure the safety of everyone and welcome everyone. But the Host may not be able to do anything about it. We will work with the host countries and do our best to ensure that all contestants who are able to participate are treated well. Ben says that the goal is to make it

clear that the IOI is welcoming and inclusive. We are aware of the value of such explicit messages.

- Culturally there are aspects that are independent of the IOI, but this is a good stance and I would like to thank Ben for this.

Voting: the Code of Conduct was approved, with 76 votes in favour, no votes against and 3 abstentions.

(b) Ben then suggested that at the closing ceremony, while people are walking in and finding their places, to have a slide up on the main screen showing an explicit statement to the students that using the hotspot name to harass is not acceptable behaviour in the IOI. This is us as leaders sending a message. The IC has endorsed this message, but we would like the GA to endorse this message as well. Ben asked for the approval of a statement from the GA, to send a message that we have not previously sent.

Discussion:

- This is a good idea. However, sending non-sexist, non-racist messages is fun, and therefore I would suggest to remove the last line, about turning off the wifi.(Several countries commented on this)

- Is the code of conduct effective immediately? If so, why not show it on the slide? Ben answers that no, the Code of Conduct will be included as an official document for IOI2019, and the intention was to keep the closing ceremony message short.

- Whilst agreeing with the message, instead of a slide, leaders should check students' mac addresses. Ben answers that we have tried in the past to use the leaders to pass the message to the students, but it has not worked, maybe because not every leader does it. The goal here is to talk directly to students.

- Do the students understand what the GA is? Ben answers that this is a good point, and proposes to change GA for "the delegation leaders, and committees of the IOI".

A show of flags demonstrated a clear majority wishing to delete the last line, so it was removed.

Voting: That we should show this statement at the closing ceremony : Approved (76 votes in favour, 1 against and 3 abstentions).

As a closing remark, Ben says today, he is proud of being part of the IOI.

The final version of the slide read as follows:
The IOI is an international, multicultural event.
We wish to remind you that understanding and respecting one another is just as important as the competition itself.
In particular, sending sexist or racist messages using wifi hotspots is not in line with the principles of IOI.
— The delegation leaders and committees of the IOI

30. Regulation Changes (Ben Burton)

(a) Relax the rules about who may be in the room of the GA (E3.2), replacing "invited guests" by

"other people" in the rule which states "Invited guests may also attend meetings of the GA with permission of the IC or the Chair of IOI'n".

Discussion:
The GA should own the GA, and therefore it should be the GA that approves who can come to the GA. Canada commented, as a past host, that there may be people you want to invite ahead of the IOI, so not being able to invite them until after the first GA meeting may not be possible. Canada suggested that we could have "or the IC", but would rather have the IC being able to make this decision before the GA.

Vote: the change was approved unanimously.

(b) Related to the time frame for bidding to host an IOI (E4.2.1). The change proposed at the first meeting was to make the rule more flexible, but it made it too flexible. The new proposal is to aim for four years in advance, but it is flexible, if needed, for the selection to be made five year in advance, but not more.

Discussion

- Some people were surprised when Singapore was announced five years in advance and there is a preference for a fixed rule for four years rather than five.

- What are the reasons a host should be elected five years ahead instead of four? The President stated that the intention is to make the decision in year n-4. However, there are situations when we have two or three bids for the same year, and if the IC considers that both bids are good enough, they could negotiate with the interested countries. The regulations didn't allow that, but the IC did it anyway. The intention of IC is not that you can make a bid five years in advance and we will make a decision. If there are two bids, we may either accept one, or accept two for n+4 and n+5, or reject both. If there are countries thinking about n+5, please let the IC know about your intention so that we can take this into consideration. Indonesia commented that in their case they preferred n+5 to n+4 because the Host for the previous year was very close geographically (Singapore).

- There was a suggestion to vote on the alternatives: (1) upper bound n-4 and (2) upper bound n-5.

Voting: proposition upper bound n-5 won (36 in favour, of (2), 29 for proposition 1)

Voting on the regulation change 65 votes in favour, 4 against and 12 abstentions.

The IC was asked to be more transparent, so that potential Future Hosts are aware of the situation. The President says that they will try to be totally transparent.

Ben commented that the new version of the regulations will be posted on the website after the IOI.

31. Election of IC, ISC and ITC members

Troy Vasiga explained the voting process to the GA: you may vote for as many people as you like, by putting a checkmark in front of the name of people you approve for the position. For the IC, there are 3 positions, two for 3 years, one for 1 year. Following the tradition, the top two candidates will be elected for the three year positions. The third placed candidate will be elected for the one year position. If there is a tie, Troy will explain how it works.

(The announcements were made later in the meeting). Results are shown in alphabetical order by surname

IC

Benjamin Burton: 57
Mowaffaq Hanandeh: 10
Mile Jovanov: 32
Eduard Kalinicenko: 37
Kresimir Malnar: 19
Bakhyt Matkarinov: 25
Hamid Zarrabi-Zadeh: 19

Benjamin Burton and Eduard Kalinicenko are elected for three years, Mile Jovanov for one year.

ISC

- Hasan Jaddouh: 10
- Johan Sannemo: 41
- Ali Sharifi-Zarchi: 54

Ali Sharifi-Zarchi was elected the new ISC member. Ali said that he hopes he can help to prepare some content about how to prepare for the IOI and make it available to contestants in all countries. He also expressed his condolences to Japan for the lives lost in the earthquake.

32. Results and confirmation of medals (Jakub Łącki)

Vote: The results and distribution of medals were approved unanimously (76 votes).

33. Announcement of future host(s)

The President stated the IC decided to make the announcement now because in this particular case it affected the composition of the IC, and the number of positions available in the election. But we still need the GA to ratify the selection of Future Hosts.

The President announced the IC, after long deliberation, decided to award IOI 2021 to Egypt.
Vote: A majority were in favour

The President stated that in the spirit of the current regulations, we need to select a host four years in advance, we are fortunate that Indonesia came forward, and after careful evaluation IC decided to award IOI 2022 to Indonesia.
Vote: Unanimously in favour

34. Proposals from GA members (Ahto Truu ,Estonia)

(a) Group Discussion about the Competition Rules.
Ahto explained that the group arrived at two proposals: (a) Ask the ISC to publish the Competition Rules as soon as possible for 2019; and (b) Competition Rules for 2020 should be approved during IOI2019.

Jakub Łącki (of ISC) commented that is a good idea, but we should allow changes, and the host should make sure there is a possibility to go back to the previous rules if the GA strongly disagrees with some of the changes. Although that is not an ISC position, Jakub was concerned that there might be issues if the rule is too strict.

Ahto stated that we have a rule that it should be 2 months in advance, and we should enforce this. We should make sure that we know the Competition Rules as soon as possible, so that we can raise concerns with sufficient time for action. We should have a timeline for much time the HSC can have. We do not like surprises about the Contest Rules. There should be some sort of balance.

Discussion:

- We don't want to have a binding rule, but I believe it's the opinion of the GA that the ISC should be asked to implement the proposal.
- Some changes like the inclusion of statistics should be discussed a year before. Some delegations might be significantly affected, and may want to alter their selection, so should have enough time between the publication of new rules and the competition.

Vote: Ask the ISC to try to publish major changes to the competition rules at least one year in advance: Approved unanimously.

(b) We should have a way to show our preference for the types of positions when there are positions for three years and others for a different number of years, since this could change the results.

The Chair said that since we have only one candidate for the ITC position, we declare that Fredrik Niemela is appointed as the new ITC member.

(c) The GA should discuss the guest fee. In some years, it is a reasonable amount as guests are treated well, but in other years a guest needs to pay half a year's salary to be accommodated in a dormitory, which is not acceptable. To keep up with the family, some of us take our spouses to the IOI, but it is unfortunate that we have to pay a high amount for this. There could be different fees for guests and spouses.

35. Notice on the proper usage of large objects in closing ceremony (Greg Lee, President)
At every IOI we have this issue of contestants coming to the stage with large objects. These objects obstruct the view of other contestants at a most important time. Please talk to your students this afternoon, so that when they come to the stage to receive their medals, they do not come with large objects. Please convey this message to students.

Discussion:

- There was an extended discussion on this ongoing problem: what constituted "large" (anything that can obscure another student), whether objects could be disallowed totally, or confiscated by the organisers as the student moves toward the stage, what to do if a student is obscured (treat them specially subsequently) and whether a notice about this should be added to the harassment slide.

The President stated that we have a suggestion that we should add an additional line to the first slide, but there are arguments that it would confuse the intention of the wifi hotspot harassment message. The medal presentation is near the end of the closing ceremony. So it might be better to have the Master of Ceremony say something at that time, or to have an extra slide at that time, stating that students should not bring objects to the stage. The third option is to ask someone at the stage to stop students from taking large objects to the stage.

The President will leave this to the host to try to do these 3 things this year. In the IC, we're talking about if someone still does it, we will record this, and in a few years, we will see what countries are

prone to do this. We could think about fines, or prevent that country from going on the stage, etc.

36. Confirmation of minutes of GA Meeting IOI2017

The Secretary explained that the minutes are missing "other business", including Mārtiņš (Latvia) suggestion about selecting new countries. The proposal is to postpone the voting of the minutes to the next IOI so that the mistakes can fixed. The secretary apologized for this.

Discussion:
Vote to accept the rest of the minutes. Otherwise, everybody's memory of what happened will have passed.

The Chair proposed a vote on the approval of the already written issues. The additional item will be written down and approved during the next IOI.
Vote: That the minutes are approved, with the understanding that the additional items will have to be approved in the future (59 in favour, 3 against, 15 abstentions).

37. Other business

a) New website
Mārtiņš Opmanis commented that the new website wasn't rebuilt from scratch, and there are several mistakes. He asked who is the webmaster of the new website, and how can I contact him?

Mile Jovanov (IC) responded that there is a contact, given on the website, editor@ioinformatics.org . You can send an email and mistakes will be corrected. Martin Mares from ITC has the rights to make changes, as well as one IC member. Martin commented that he is not the editor, he has write access only for emergencies.

The President clarified that Mathias Hiron (IC) has editing rights, we will be cleaning up and revising the new website relatively soon. If you see things that are wrong, please let us know and we will fix them.

b) What is the date for IOI2019?

Araz Yusubov (IC, Azerbaijan) said he is excited to welcome you all to Baku. Please check our website: ioi2019.az, which is up and running. There will be a call for tasks very soon and please send great tasks. The tentative dates are in early August. We will have final dates announced on our website no later than early October.

Discussion:

- It is very inconvenient not to have the dates in advance. For future hosts, please tell us the competition date much sooner than this. Many other events depend on the dates of the IOI, and we do not want to have conflicts.
- We also need to know the deadline for the registration, as this may affect team selection.

c) Troy Vasiga (Canada) thanks the host for a very nice IOI. A large round of applause for the Host followed.

The Chair thanked everybody and apologized for this GA taking such a long time.

The President said he wanted to thank Ricardo for his service in the last two years as Secretary, and announced the new Secretary will be Margot Phillipps (New Zealand). The President thanked the Chair for conducting the General Assembly, the organizers for an excellent IOI and every country for

their participation in the GA.