



*Fédération  
Aéronautique  
Internationale*

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# Competition Rules

For  
**Canopy Formation**

2011 Edition  
Effective 1 March 2011

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# **FEDERATION AERONAUTIQUE INTERNATIONALE**

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Each FAI Air Sport Commission<sup>8</sup> may negotiate agreements, with FAI Members or other entities authorised by the appropriate FAI Member, for the transfer of all or parts of the rights to any FAI International Sporting Event (except World Air Games events<sup>9</sup>) in the discipline<sup>10</sup>, for which it is responsible<sup>11</sup> or waive the rights. **Any such agreement or waiver, after approval by the appropriate Air Sport Commission President, shall be signed by FAI Officers**<sup>12</sup>.

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- 1 FAI Statutes, .....Chapter 1, .....para. 1.6
  - 2 FAI Sporting Code, Gen. Section, .....Chapter 3, .....para 3.1.3.
  - 3 FAI Statutes, .....Chapter 1, .....para 1.8.1
  - 4 FAI Statutes, .....Chapter 2, .....para 2.1.1; 2.4.2; 2.5.2 and 2.7.2
  - 5 FAI By-Laws, .....Chapter 1, .....para 1.2.1
  - 6 FAI Statutes, .....Chapter 2, .....para 2.4.2.2.5
  - 7 FAI By-Laws, .....Chapter 1, .....paras 1.2.2 to 1.2.5
  - 8 FAI Statutes, .....Chapter 5, .....paras 5.1.1, 5.2, 5.2.3 and 5.2.3.3
  - 9 FAI Sporting Code, Gen. Section, .....Chapter 3, .....para 3.1.7
  - 10 FAI Sporting Code, Gen. Section, .....Chapter 1, .....paras 1.2. and 1.4
  - 11 FAI Statutes, .....Chapter 5, .....para 5.2.3.3.7
  - 12 FAI Statutes, .....Chapter 6, .....para 6.1.2.1.3

## 1. FAI Authority

*The competition will be conducted under the authority granted by the FAI, according to the regulations of the Sporting Code of the FAI, General Section, and Section 5 as approved by the IPC and validated by the FAI, and these rules. All participants accept these rules and the FAI regulations as binding by registering in the competition.*

## 2. Definitions of Words and Phrases used in these Rules

2.1. **Formation:** Consists of 2 or more jumpers and canopies linked by grips, correct or not.

2.2. **Grip:** Consists of a hand hold or hook with a foot on an "A" line or front riser so that a formation is built in accordance with the diagrams.

2.3. **Configurations:**

2.3.1. **Stack:** The shoulder of the upper jumper must be above the upper surface of the lower canopy. A grip must be on an "A" line attached to the centre cell.

2.3.2. **Stair/step:** The shoulder of the upper jumper must be above the upper surface of the lower canopy. The grip must only be on the outside "A" line of the end cell. The grip must be taken with the inside leg or foot; this may include an additional handhold, if desired.

2.3.3. **Plane:** The head of the upper jumper must be below the lower surface of the lower canopy. A grip must be on a front riser or an "A" line attached to the centre cell.

2.3.4. **Plane/stack:** Plane, stack or any position on a riser or an "A" line attached to the centre cell between these configurations. A correct grip must be maintained.

The above configurations only apply to complete formations.

2.4. **Inter:** The stage between two formations. An inter must be flown and remain intact with the correct grips.

2.5. **Sequence:** *A series of blocks and random formations that are designated by the draw.*

2.6. **Working time:** The working time begins at the moment of the first separation of a grip from the first formation whether correct or not, or 30 seconds after exit of the first team member, including the team's videographer, whichever is first.

2.7. **NV:** Formations, inters, or total separations not visible on screen due to meteorological conditions (such as rain, clouds, sun, etc.) or factors relating to the Videographer's video equipment that cannot be controlled.

2.8. **Omission:** A formation or inter missing from the drawn sequence or no clear intent to build the correct formation or inter is seen, and another formation or inter is presented.

### 3. The Events

3.1. The discipline will be comprised of the following events:

- 3.1.1. 2-Way Sequential Event – 8 rounds
- 3.1.2. 4-Way Sequential Event – 8 rounds
- 3.1.3. 4-Way Rotation Event – 8 rounds

3.2. A minimum of 1 round must be completed to establish Winners in any event.

3.3 **Objective of the events:** The accumulated total of all completed rounds is used to determine the final rank of the teams and declare the winner.

3.4. **Performance requirement:**

3.4.1. **2-way Sequential Event:** Each round consists of a repeatable sequence drawn from the dive pool.

3.4.2. **4-way Sequential Event:** Each round consists of a repeatable sequence drawn from the dive pool.

3.4.3. **4-way Rotation Event:** Each round consists of successive 4-way plane/stack formations made by rotations. Rotations must be made by the top competitor in the complete formation dropping grips, flying to the bottom of the formation and again completing a 4-way plane/stack formation. The inter is the remaining correctly completed 3-way plane/stack formation.

3.5. **Determination of winners**

3.5.1. Where only one round is completed, the team that has the best score for that one round.

3.5.2. Where more than one round is completed, the team that has the best score after discarding their lowest score in the completed rounds (a disqualification or penalty score may not be discarded), calculated as follows:

3.5.2.1. Have the greatest number of formations in the completed rounds.

3.5.2.2 If 2 or more teams have an equal number of formations, the first 3 places will be decided by the highest number of points in any completed round for each team.

3.5.2.3. If there is still a tie, the team with the fastest time in those rounds with the highest points wins the tied place.

3.5.2.4 Tied teams placed lower than third remain tied.

## 4. General Rules

### 4.1 Equipment:

4.1.1. Canopy Formation must not be performed using a reserve parachute.

4.1.2. Competitors must carry the following equipment:

4.1.2.1. Each team member must carry a hook-knife for emergency use.

4.1.2.2. Each member of each team must carry a serviceable altimeter.

### 4.2 Meteorological Conditions:

4.2.1. When air turbulence is apparent or clouds at lower altitudes affect visibility, the Meet Director may decide to raise the exit altitude. The Meet Director must inform all jumpers of the decision. This decision is not open to protest.

4.2.2. Teams may refuse to jump in rain or turbulent conditions. The Meet Director, FAI Controller and the Chief Judge by unanimous decision may decide to continue the event. If a team aborts a jump a second time for the same reason, that team will not jump that round and must be awarded the maximum or minimum score, whichever is worse.

4.2.3. Rain during a jump is not grounds for protest.

4.3. All forms of Canopy Formation jumping must cease by 750 meters (~2500 ft). The FAI Controller has the authority to disqualify a team that breaks this rule, for that round or the whole event.

4.4. After working time has elapsed, only the drawn sequence for that round may be performed. If any other sequence is performed the team will receive a score of zero for that round.

### 4.5. The Draw:

The draw of the sequences and the jump order will be supervised by the Chief Judge. The teams will be given not less than 2 hours knowledge of the results before the competition starts.

### 4.6. Practise jumps:

Practise jumps may not be made after the draw has been made public. If time allows these jumps may be assessed by the judges and, if assessed, the score shall be published.

### 4.7. Jump order:

The drawn jump order will be used for all rounds. Time permitting, and at the discretion of the Meet Director, reverse order of ranking may be used for the final two rounds.

### 4.8. Exit procedure:

4.8.1. There is no limitation on the exit other than those imposed by the Chief Pilot for safety reasons. The pilot must maintain the altitude and direction until the aircraft is well clear of the jumpers.

4.8.2. Teams will be responsible for their own exits once the aircraft has commenced the jump run and the team has been cleared to exit.

4.8.3. The exit of the first team member must be clearly shown on the team's video recording. Failure to clearly show the exit of the first team member will result in a score of zero, for that round.

4.8.4. The pilot chute must not be withdrawn from the equipment until the team member is clear of the aircraft.

#### 4.9. Video Transmission and Recording:

4.9.1 Each team shall provide the video evidence required to judge each round. Each freefall Videographer must use the video transmission system if provided by the Organiser.

4.9.2 For the purpose of these rules, «freefall video equipment» shall consist of the complete video system(s) used to record the video evidence of the team's freefall performance, including the camera(s), recording media, cables and battery(ies). All video equipment must be able to deliver a PAL digital signal through a compatible video connection approved by the Video Controller.

The videographer is responsible for ensuring the compatibility of their freefall video equipment with the scoring system.

4.9.3 As soon as possible after each jump is completed, the freefall videographer must deliver the freefall video equipment (including the video used to record that jump) for dubbing at the designated dubbing station. The video evidence must remain available for viewing or download until all scores are posted as final.

4.9.4 Only one video recording will be dubbed and judged. Secondary video recordings may only be used in NV situations.

4.9.5 The dubbing station will be as close to the landing area as possible.

4.9.6 A Video Controller will be appointed by the Chief Judge prior to the start of the Judges' Conference. The Video Controller may inspect a team's freefall video equipment to verify that it meets the performance requirements as determined by him/her. Inspections may be made at any time during the competition which do not interfere with a team's performance, as determined by the Event Judge. If any freefall video equipment does not meet the performance requirements as determined by the Video Controller, this equipment will be deemed to be unusable for the competition.

4.9.7 A Video Review Panel (VRP) will be established prior to the start of the official training jumps, consisting of the Chief Judge, the President of the Jury and the FAI Controller. Decisions rendered by the Video Review Panel shall be final and shall not be subject to protest or review by the Jury.

4.9.8 If the Video Review Panel determines that the freefall video equipment has been deliberately tampered with, the team will receive no points for all competition rounds involved with this tampering. These rounds shall not be used as a worst performance discard.

#### 4.10. Rejumps:

4.10.1. In the case of an NV, the Video Review Panel will assess the conditions and circumstances surrounding that occurrence and may award a rejump. Should the Video Review Panel determine that there has been an intentional abuse of the rules by the team, or by the videographer on behalf of the team, no rejump will be granted and they will receive zero points, for that jump.

4.10.2. Problems with a team's equipment are not reasons for a rejump, except as determined in an NV situation.

4.10.3. Contact or other means of interference, between a team and its videographer are not reasons for the team to request a rejump.

#### 4.11. Scoring:

4.11.1. All formation and inter requirements must be completed and recorded in such a manner that the judges may determine that the required performance has been achieved. Provision of the video evidence for judging purposes is the responsibility of the team.

4.11.2. If a competitor, or team, is disqualified for a jump, they will receive zero points for that jump. In this situation, the disqualification or penalty score shall not be used as the discarded round.

## 5. Rules Specific to the Events

### 5.1. 2-Way Sequential Event

5.1.1. Exit altitude shall be 1850 meters (~6,000 ft) AGL with a working time of 60 seconds.

5.1.2. The draw of the sequences: Each round consists of 5 formations that have been drawn from the dive pool of 12 formations (2 of each). After each sequence is drawn, the 5 formations shall be returned to the dive pool so that they may be drawn again.

5.1.3. **Scoring:** Teams will be awarded one point for the first correct formation and subsequent correct formations that are preceded by total separation within the working time. Teams will not be awarded points for incorrect formations. There will be no penalty.

5.1.4. **Omissions:** Omission of a formation will stop the scoring at that formation. The next formation to score is the second correctly completed formation following the last omission. Scoring may also continue if the team goes back to correctly complete the omitted formation or incorrect formation.

5.1.5. Each formation must be performed in accordance with the illustrations in the drawn sequence. Jumper position for each random is set by the draw, i.e. the dark canopy position on the first formation built within a round must remain in the dark canopy position on all subsequent formations of that round. There must be release of all grips between each formation. No mirror formations are allowed. All formations shall be performed as shown in the dive pool, as seen from behind.

### 5.2. 4-Way Sequential Event:

5.2.1. Exit altitude shall be 2500 meters (~8,200 ft) AGL with a working time of 120 seconds.

5.2.2. **The draw of the sequences:** Each block sequence or random from the Dive Pool will be drawn only once for each competition. All rounds shall consist of four or five scoring formations, whichever number is reached first.

5.2.3. **Scoring:** Teams will be awarded one point for the first formation and each subsequent formation or formations preceded by an inter correctly completed within the working time. Teams will not be awarded points for incorrect formations. There will be no penalty.

5.2.4. **Omissions:** Omission of a formation will stop the scoring at that formation. The next formation to score is the second correctly completed formation following the last omission. Scoring may also continue if the team goes back to correctly complete the omitted formation, incorrect formation or formation prior to the incorrect inter requirement. An attempt to complete a formation, although incorrect or incomplete, demonstrated by at least 3 canopies connected with grips, and in the formation required by the drawn sequence, will be judged as an incorrect formation, not as an omission.

5.2.5. Each formation and inter requirement must be performed in accordance with the drawn sequence. Where there is no inter requirement between formations, there must be release of all grips between all canopies at one point in time. Mirror images are acceptable for complete blocks and random formations. Formations need not be symmetrical. At the end of a sequence there must be release of all grips before restarting the sequence as drawn.

### 5.3. 4-Way Rotation Event:

5.3.1. Exit altitude shall be 2150 meters (~7,000 ft) AGL with a working time of 90 seconds.

5.3.2. **Scoring:** Teams will be awarded one point for the first correctly completed formation and every correctly completed 4-way plane/stack formation within the working time, according to the performance requirement.



**6. Judging Rules**

6.1. The judges may use an electronic scoring system to record their evaluation of the performance.

6.2. The judges will watch each performance once at normal speed. At the request of any working judge, a second viewing at normal speed may be made. If, after the second viewing has taken place and a clear decision has not been made as to when the working time begins, the Event Judge may guide the Panel of Judges when to start their chronometers. A third viewing at normal speed may only occur when authorised by the Event Judge. The judges shall start the timing when the first team member (including the team's videographer) leaves the aircraft. At the end of working time, freeze frame of the video image shall be applied.

6.3. Each performance must be evaluated by a panel of five judges.

6.4. A majority of Judges must agree in the evaluation in order to;

- credit the scoring formation, or
- assign an omission, or
- determine an NV situation.

6.5. If the Judges use score sheets to record their evaluation, they will operate their own chronometer and use the signs below to record their assessment. The score sheets of all judges must be collected immediately after the judges have scored the jump for checking by the Event Judge and Chief Judge. Freeze frame of the video image need not be used.

**Situation:**

- Correct scoring formation.....	√
- Incorrect or incomplete formation or inter .....	0
- Omission .....	X
- NV Situation .....	NV
- End of working time .....	//

6.6 All judge's scores shall be posted.

## 7. Rules Specific to the Competition

7.1. **Title of the competition:** The XV World Parachuting Championships of Canopy Formation

### 7.2. Aims of the XV World Parachuting Championships of Canopy Formation

7.2.1. To determine the Champions of Canopy Formation in the following events:

- 2way Sequential
- 4way Sequential
- 4way Rotation

7.2.2. To determine the world standings of the competing teams.

7.2.3. To establish Canopy Formation world records.

7.2.4. To promote and develop Canopy Formation competition.

7.2.5. To exchange ideas and strengthen friendly relations between the sport parachutists of all nations.

7.2.6. To allow participants to share and exchange experience, knowledge and information.

7.2.7. To improve judging methods and practices.

### 7.3. Composition of Delegations:

7.3.1. Each delegation may be comprised of:

- One (1) Head of Delegation,
- One (1) Team Manager

7.3.2. At a World Parachuting Championship or Continental Championship:

- Two 2-way teams consisting of up to 4 members, any of who may be the team videographer.
- One 4-way Sequential team consisting of up to six (6) members, any of who may be the team videographer.
- One 4-way Rotation team consisting of up to six (6) members, any of who may be the team videographer.

7.3.3. At a World Cup: Any number (to a maximum of 4) teams per event (composed as for a World Championship) to be decided by the Organizer.

7.3.4. Videographers must be entered for each team as part of the delegation. The evaluation process for the video evidence will be the same for any Videographer. Videographers may be one of the following:

- a) one of the members of the team and meet all the requirements necessary to be on the team and is eligible to receive medals and awards or;
- b) any other person. This Videographer is not eligible to receive awards and medals. In this case there may be no more than three (3) competitors in a 2-Way team, and no more than five (5) competitors in a 4-Way team. This Videographer may jump only as a Videographer and is subject to the same regulations as other competitors on the team. A Videographer may be replaced at any time during the competition, (with the agreement of the Meet Director) in which case the replacement Videographer will not be eligible for awards and medals.

7.3.5. Each competitor and videographer shall only be allowed to compete for one team in each event.

7.4. **Protest fee:** A fee of € 50 must accompany each protest.

## 8. Dive Pool

### 8.1. Definitions used in the formation diagrams are as follows:

#### 8.1.2 Canopy identification:



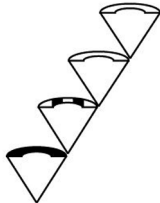

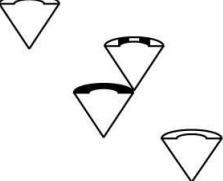
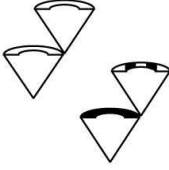
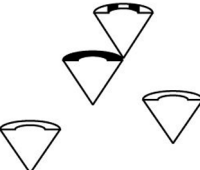
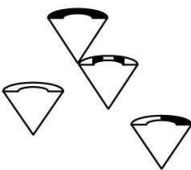

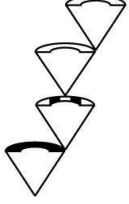

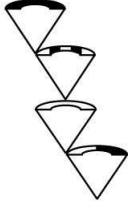
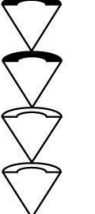
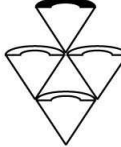

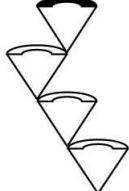
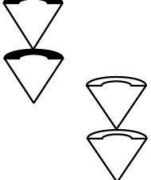
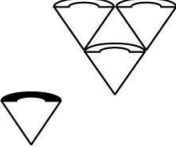
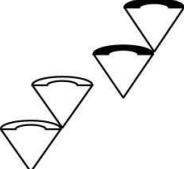
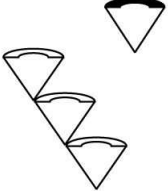

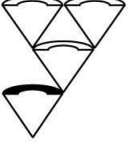

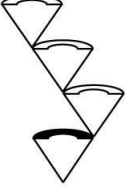



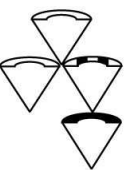


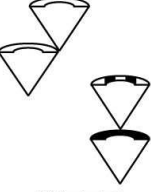
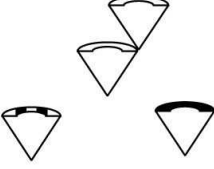
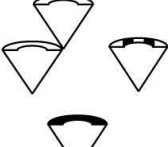
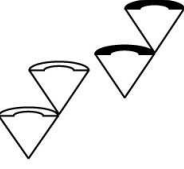

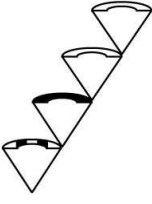
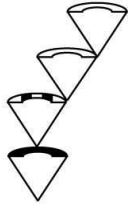

8.1.3. Block sequence numbers: 1 2 3 4


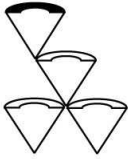
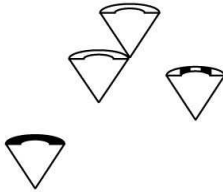
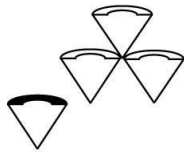

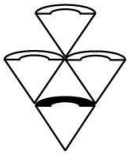
8.1.4. Random formation letters: A B C D

8.1.5. Intermediate requirement: INTER

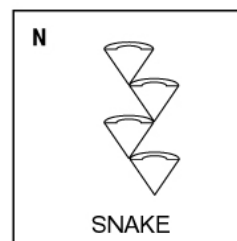
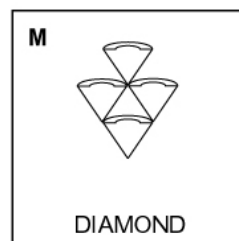
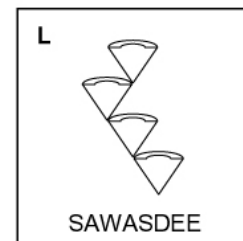
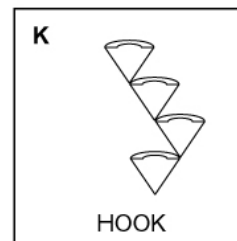
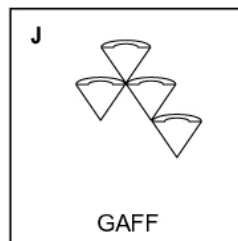
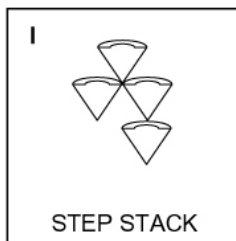
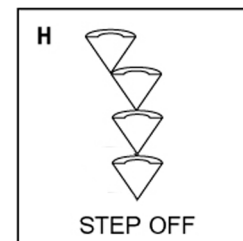
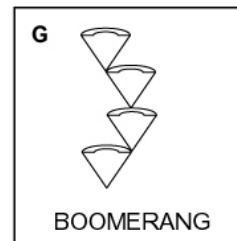
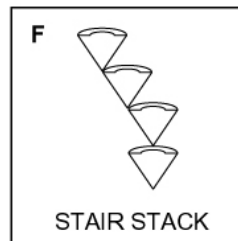
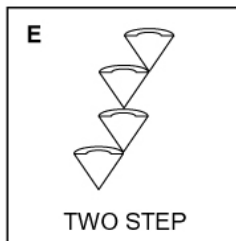
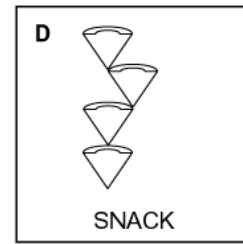
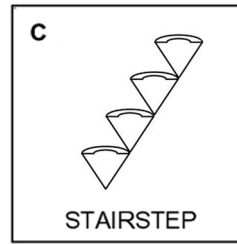
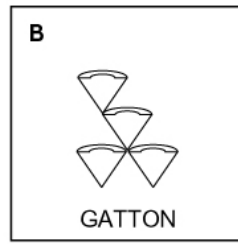
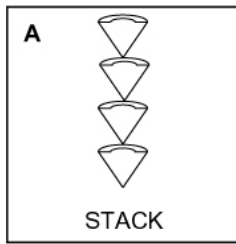
8.2 4way Sequential Block Formations

<p>1</p>  <p>SNAKE</p>	<p>2</p>  <p>DIAMOND</p>	<p>3</p>  <p>STAIRSTEP</p>	<p>4</p>  <p>STEP STACK</p>
 <p>INTER</p>	 <p>INTER</p>	 <p>INTER</p>	 <p>INTER</p>
 <p>GATTON</p>	 <p>TWO STEP</p>	 <p>SNAKE</p>	 <p>TWO STEP</p>
<p>5</p>  <p>STACK</p>	<p>6</p>  <p>DIAMOND</p>	<p>7</p>  <p>DIAMOND</p>	<p>8</p>  <p>SAWASDEE</p>
 <p>INTER</p>	 <p>INTER</p>	 <p>INTER</p>	 <p>INTER</p>
 <p>STACK</p>	 <p>VICHY</p>	 <p>DIAMOND</p>	 <p>HOOK</p>

<p><b>9</b></p>  <p>STEP STACK</p>	<p><b>10</b></p>  <p>STEP STACK</p>	<p><b>11</b></p>  <p>SNAKE</p>	<p><b>12</b></p>  <p>STAIRSTEP</p>
 <p>INTER</p>	 <p>INTER</p>	 <p>INTER</p>	 <p>INTER</p>
 <p>SNACK</p>	 <p>STAIRSTEP</p>	 <p>STAIR STACK</p>	 <p>DIAMOND</p>

<p><b>13</b></p>  <p>DIAMOND</p>	<p><b>14</b></p>  <p>GATTON</p>
 <p>INTER</p>	 <p>INTER</p>
 <p>GATTON</p>	 <p>DIAMOND</p>

8.3 4-Way Random Formations:



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8.4 2-Way Random Formations:

