



International  
**Paralympic**  
Committee

## **VISTA 2013 Scientific Programme**

**Detailed programme description**

May 1-4 2013

**International Paralympic Committee**

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	<b>WEDNESDAY 1 MAY 2013</b>
10:30 – 20:00* GSI Welcome Desk	<b>Conference Registration</b> <i>*Opening times will be confirmed closer to the event</i>
17:00 - 20:00 Maritim Hotel	<b>Opening Ceremony</b>

	<b>THURSDAY 2 MAY 2013</b>
09:00 – 09:15 VISTA Room 1	<b>Paralympic Scientific Award Ceremony</b>
09:15 – 10:00 VISTA Room 1	<b>Paralympic Sport Equipment: Performance Enhancement or Necessary for Performance?</b>  Keynote Lecture, Brendan Burkett (University of the Sunshine Coast, Australia; Member IPC Sports Science Committee)
10:00 – 10:30	<i>Coffee Break</i>
10:30 - 12:10	<b>SESSION A - INVITED SYMPOSIUM 1</b>
VISTA Room 1	<b>Cycling Covering Equipment and Technology Development in Tricycles, Handcycles and Tandem Cycling</b>  <b>Moderator: Thomas Abel</b> (Deutsche Sporthochschule Köln, Germany)  <b>Panel Members:</b> <b>Claudio Perret</b> (Schweizer Paraplegiker – Zentrum, Switzerland) <b>Karine Jacon Sarro</b> (Centro de Educacao Fisica e Desportos, Universidade Federal do Espirito Santo, Brazil) <b>Oliver Heine</b> (German Olympic and Paralympic Training Centre ,Germany) <b>Vicky Tolfrey</b> (Peter Harrison Centre for Disability Sport, Loughborough University, UK)



<b>10:30 - 12:10</b>	<b>SESSION B – FREE COMMUNICATIONS I</b>
VISTA Room 2	<b>Paralympic Swimming</b>
10:30	Relationship between Passive Drag and IPC Swimming Class <b>C. Payton - #45</b>
10:50	Relationship between Passive Drag and Anthropometric Characteristics of Swimmers with a Physical Impairment <b>Y-T. Oh - #42</b>
11:10	The Effect of Tether Speed on Muscle Activation and Recruitment Patterns in Physically Impaired Swimmers <b>C. Lee - #34</b>
11:30	Comparison of Race Parameters for Visual Impaired Swimmers <b>J. Martens - #39</b>
12:10 – 13:40	<i>Lunch Break</i>
<b>13:40 – 14:40</b>	<b>SESSION A – FREE COMMUNICATIONS II</b>
VISTA Room 1	<b>Coaching and Counselling</b>
13:40	Wheeled Mobility in Sports: Replicating Sports Wheelchair Propulsion in a Laboratory Environment <b>B. Mason - #40</b>
14:00	Acceleration Profile during 20-M Sprints in Elite Wheelchair Tennis Players <b>T. Janssen - #29</b>
14:20	Test-Retest Reliability of Different Test Concepts in Ice Sledge Hockey <b>Ø. Sandbakk - #55</b>
14:40	A Comparison of Wheelchair Tennis Player Development Pathways, Focusing on Changes in Regional Representation and Case Studies of Players Progression <b>M. Bullock - #9</b>



<b>13:40 – 14:40</b>	<b>Session B – FREE COMMUNICATIONS III</b>
VISTA Room 2	<b>Equipment Design</b>
13:40	Lower Leg Prosthesis for Nordic Skiing Skate Technique – from Prototype to Production <b>J. Danvind - #13</b>
14:00	Lower Leg Prosthesis for Cross-Country Skiing Classical Technique <b>P. Skoglund - #58</b>
14:20	Optimization of Sledge Properties in Ice Sledge Hockey <b>P. Kjarnli - #32</b>
14:40 – 15:00	<i>Coffee Break</i>
<b>15:00 – 16:20</b>	<b>Session A – FREE COMMUNICATIONS IV</b>
VISTA Room 1	<b>Classification Concepts and Methodology</b>
15:00	Autonomic Cardiovascular Control and Sports Classification in Paralympic Athletes with Spinal Cord Injury <b>A. Krassioukov - #33</b>
15:20	Visual Impairment and Sporting Performance: Implications for Vision Classification in Paralympic Sport <b>D. Mann - #38</b>
15:40	Analysis of Table Tennis Specific Tests for Players with Intellectual Impairment <b>S. Wu - #71</b>
<b>15:00 – 16:20</b>	<b>Session B – FREE COMMUNICATIONS V</b>
VISTA Room 2	<b>Equipment Design</b>
15:00	Effect of Low Compression Balls on Wheelchair Tennis Matchplay <b>P. Sindall - #57</b>
15:20	Influence of Non-Circular Chainrings on Physiological Parameters in Handcycling <b>S. Zeller - #72</b>



15:40	<p>Technical Development of an Adaptive Sports Ankle Prosthetic Component as an Equipment Aid for the Lower Leg Amputee Paratriathlete during the Transition to and from the Swimming Event.</p> <p><b>D. K. Lyle - #37</b></p>
16:00	<p>Sports Equipment and Technology in Developing Nations: Grass Root Initiatives to Enhance Parasports in Kenya</p> <p><b>P. Bukhala - #08</b></p>
16:20 – 16:40	<i>Coffee Break</i>
<b>16:40 – 18:20</b>	<b>SESSION A – INVITED SYMPOSIUM 2</b>
VISTA Room 1	<p><b>Equipment Development in Winter Sports</b></p> <p><b>Moderator: Brendan Burkett</b> (University of the Sunshine Coast, Queensland, Australia; Member IPC Sports Science Committee)</p> <p><b>Panel Members:</b></p> <p><b>Laura Gastaldi</b> (Dipartimento di Ingegneria Meccanica e Aerospaziale Politecnico di Torino, Italy)</p> <p><b>Sylvana Mestre</b> (Play and Train, Spain; Chairperson IPC Alpine Skiing Sports Technical Committee)</p> <p><b>Vesa Linnamo</b> (Department of Biology of Physical Activity University of Jyväskylä , Finland)</p>
<b>16:40 – 18:20</b>	<b>SESSION B – FREE COMMUNICATIONS VI</b>
VISTA Room 2	<b>Classification in Athletes with Hypertonia, Ataxia and Athetosis</b>
16:40	<p>Evaluating the Validity of Tests of Impaired Coordination and Range of Motion in Runners with Hypertonia, Ataxia and Athetosis</p> <p><b>M. Connick - #10</b></p>



17:00	Evaluating the Validity of a Novel Battery of Upper and Lower Limb Coordination and Throwing Performance in Athletes with Hypertonia, Ataxia and Athetosis <b>J. Spathis - #61</b>
17:20	The Assessment of Lower Limb Muscle Strength and Running Performance in Athletes with Ataxia, Athetosis and Hypertonia <b>E. Beckman - #05</b>
17:40	Adaptation of Block and Box Test to Evaluate Grasp and Release in Boccia Players <b>R. Reina - #47</b>

	<b>FRIDAY 3 MAY 2013</b>
09:00 – 10:00 VISTA Room 1	<b>Equipment and Technology: from Products for Grass Roots Development to High-Tech Applications</b>  Keynote Lecture, Chris Rushman (Motivation, UK) / Simone Oehler (Otto Bock, Germany)
10:00 – 10:30	<i>Coffee Break</i>
10:30 – 12:10	<b>SESSION A - INVITED SYMPOSIUM 1</b>
VISTA Room 1	<b>Athlete Health</b>  <b>Moderator: Walt Thompson</b> (Georgia State University Department of Kinesiology and Health, USA; Member IPC Sports Science Committee)  <b>Panel Members:</b> <b>David MacDonagh</b> (Emergency Sports Medicine Research Centre, NTNU University, Norway) <b>Wayne Derman</b> (UCT Sport Science Institute of South Africa, University of Cape Town, South Africa; Member IPC Medical Committee) <b>Julia Alleyne</b> (Sport C.A.R.E., Women's College Hospital, Canada)



<b>10:30 – 12:10</b>	<b>SESSION B – FREE COMMUNICATIONS I</b>
VISTA Room 2	<b>Wheeled Mobility</b>
10:30	Wheeled Mobility in Adapted Sports: an Ergonomics Perspective <b>L. van der Woude - #65</b>
10:50	Wheeled Mobility in Sports: Time and Power Output over a 15m-Wheelchair Sprint as Measures of (Anaerobic) Sprint Capacity <b>J. van der Scheer - #64</b>
11:10	Wheeled Mobility in Sports: Skill Acquisition of Handrim Wheelchair Propulsion <b>R. Vegter - #66</b>
11:30	Wheeled Mobility in Sports: Optimal Training in Handcycling <b>F. Hettinga - #24</b>
12:10 – 13:40	<i>Lunch Break</i>
<b>13:40 – 14:40</b>	<b>SESSION A – FREE COMMUNICATIONS II</b>
VISTA Room 1	<b>Ergometry</b>
13:40	Compact Dynamometry in Wheelchair Sports: a New Concept for Evaluation the Propulsive Power <b>S. Oliveira - #43</b>
14:00	Paralympic Athletes Fitness Using a New Wheelchair Ergometer <b>D. Freitas - #19</b>
<b>13:40 – 14:40</b>	<b>SESSION B – FREE COMMUNICATIONS III</b>
VISTA Room 2	<b>Classification Concepts and Methodology</b>
13:40	Evidence Based Practice in Classification: Application of Systematic Review in Wheelchair Rugby <b>A. Hart - #23</b>
14:00	Can Simulations Assist in Classification Development? <b>J. Holmberg - #25</b>



14:20	A Conceptual Framework for the use of Fitts' Law to Detect Intentional Misrepresentation of Skills and/or Abilities in Paralympic Athletics <b>S. Tweedy - #15</b>
14:40 – 15:00	<i>Coffee Break</i>
<b>15:00 – 16:20</b>	<b>SESSION A – FREE COMMUNICATIONS IV</b>
VISTA Room 1	<b>Athlete Health / Participation and Legacy</b>
15:00	Assessment of Fatigue in Athletes During Manual Wheelchair Propulsion <b>B. Crespo Ruiz - #12</b>
15:20	Performance, Pacing and Neuromuscular Fatigue of Athletes with Cerebral Palsy <b>P. Runciman - #51</b>
15:40	London 2012 Volunteers: Motivations and Social Legacy Potential <b>T. Dickson - #16</b>
16:00	Reliability of Goal Perspectives and Sport Participation Motivation Questionnaires for Athletes with Intellectual Disabilities <b>Y. Hutzler - #27</b>
<b>15:00 – 16:20</b> VISTA Foyer	<b>SESSION B – POSTER SESSION</b>
	New Wheelchair Ergometer for Physical Evaluation and Training – Electronic Systems and Methodology <b>S. A. A. Vieira - #1</b>
	New Wheelchair Ergometer for Physical Evaluation and Training – Design and Tests <b>C. A. Araújo - #3</b>
	Analysis of Relationship Between Strength and Speed in Athletes with Visual Impairment and Guides Participants of Athletics Brazil Paralympic Team <b>R. A. Barros - #4</b>





	<p>Chair of Shot Put Designed to Paralympic Athletes</p> <p><b>E. D. Bonifácio - #7</b></p>
	<p>Pulley System to Assess Resistive Power During Manual Wheelchair Propulsion on a Treadmill</p> <p><b>B. Crespo-Ruiz - #11</b></p>
	<p>Wheeled Mobility in Sports: the Development of a Wheelchair Propulsion Lab</p> <p><b>S. de Groot - #14</b></p>
	<p>Functional Classification of Athletics in Paralympic School Games: a Sample of the Four Editions.</p> <p><b>P. S. de Freitas - #20</b></p>
	<p>The Functional Classifiers Training in Brazil</p> <p><b>P. S. de Freitas - #21</b></p>
	<p>Psycho-Social Effects of an Intensive Competitive Boccia Training Program Compared to Recreational Boccia Training and no Training in Persons with Severe Chronic Disability</p> <p><b>Y. Hutzler - #26</b></p>
	<p>Wheeled Mobility in Sports: Hand-rim forces and gross mechanical efficiency in asynchronous and synchronous wheelchair propulsion: a comparison</p> <p><b>J. Lenton - #35</b></p>
	<p>Technical Development of an Adaptive Sports Ankle Prosthetic Component as an Aid for the Lower Leg Amputee Equestrian Paralympics' Rider to Achieve Optimum Balance and Alignment.</p> <p><b>D. K. Lyle - #36</b></p>
	<p>This works: Equipment rental services for disability sports and recreation</p> <p><b>J. Parviainen - #44</b></p>
	<p>Evidence-Based Research Starting Point for Classification in Paralympic Football-7-A-Side</p> <p><b>R. Reina - #48</b></p>



	<p>Assessing Wheelchair Locomotion Through the use of Gyroscope Technology</p> <p><b>J. Rhodes - #49</b></p>
	<p>Promotion of Accessibility from Disability Sports Point of View -Lessons Learned</p> <p><b>A. Saari - #54</b></p>
	<p>Kinematic Evaluation of Paralympic Supine</p> <p><b>S. Soares - # 56</b></p>
	<p>Hand Prosthesis for Cross-Country Skiing</p> <p><b>H.S. Sjöberg - #59</b></p>
	<p>Evaluation of the Brazilian Paralympic Committee Anti-Doping Program from 2009 to 2012. A Critical Review</p> <p><b>H. Silva - #60</b></p>
	<p>Wheeled Mobility in Sport: Hand Cycling the Alpe d'Huez with a SCI</p> <p><b>L. Valent -#63</b></p>
	<p>Functional Profile and Age of Football Seven a Side Brazilian Athletes</p> <p><b>M. da Silva Campeão - #67</b></p>
	<p>Wind Tunnel to Evaluate Alpine Skiing Paralympic Athletes</p> <p><b>N. A. C. Vinagre - #68</b></p>
	<p>Evaluation of Muscle Imbalances and the Relationship with Sport Injuries in Athletes with Visual Impairment and their Guides.</p> <p><b>M.P. Magno e Silva - #70</b></p>
16:20 – 16:40	<i>Coffee Break</i>



<b>16:40 – 18:20</b>	<b>INVITED SYMPOSIUM 2</b>
VISTA Room 1	<p><b>Technology and Paralympic Classification</b></p> <p><b>Moderator: Yves Vanlandewijck</b> (Department of Rehabilitation Sciences, KU Leuven, Belgium; Chairperson IPC Sports Science Committee)</p> <p><b>Panel Members:</b></p> <p><b>David Howe</b> (Peter Harrison Centre for Disability Sport, Loughborough University, UK)</p> <p><b>Sean Tweedy</b> (School of Human Movement Studies, The University of Queensland, Australia; Member IPC Classification Committee)</p>
<b>16:40 – 18:20</b>	<b>SESSION B – FREE COMMUNICATIONS V</b>
VISTA Room 2	<b>Participation and Legacy</b>
16:40	<p>Paralympic Legacy – Realising its Potential</p> <p><b>S. Kerr - #31</b></p>
17:00	<p>Chances and Challenges of Talent Identification and Development (TID) Programmes for Paralympic Athletes – Selected Results of a Cross-National Comparison</p> <p><b>S. Radtke - #46</b></p>
17:20	<p>Follow up of Integration and Inclusion Phase Report of Finnish Sports Federations</p> <p><b>A. Saari - #53</b></p>
17:40	<p>Developing the Paralympic Movement in West Africa: Challenges and Opportunities for Social Inclusion in Ghana</p> <p><b>Y. Tuakli-Wosornu - #62</b></p>



	<b>SATURDAY 4 MAY 2013</b>
09:00 – 10:00 VISTA Room 1	<b>The Balance between Access, Competitive Edge and the Philosophy of Sport</b>  Keynote lecture, Ivo Van Hilvoorde (Faculty of Human Movement Sciences, Netherlands)
10:00 – 10:30	<i>Coffee Break</i>
10:30 – 12:10	<b>SESSION A - INVITED SYMPOSIUM 1</b>
VISTA Room 1	<b>Technology Counselling: Technology in Paralympic Training</b>  <b>Moderator: Osnat Fliess Douer</b> (Wingate College, Israel; School of Education Bar – Ilan University, Israel, Member IPC Sports Science Committee)  <b>Panel Members:</b> <b>Dr. Richardo Barros</b> (Faculty of Physical Education, University of Campinas, Brazil) Use of Tracking Systems for Athlete/Coach Feedback <b>Dr. Marco Cardinale</b> (English Institute of Sport, Exercise and Health, University College London, UK; School of Medical Sciences, University of Aberdeen, Scotland) Technology for the coach and the athlete: state of the art and future developments <b>Randall L. Wilber</b> (USOC Athlete Performance Lab, USOC, USA) Use of Hypoxic Units in the Preparation of Paralympic Athletes
10:30 – 12:10	<b>SESSION B – FREE COMMUNICATIONS I</b>
VISTA Room 2	<b>Athlete Health</b>
10:30	Autonomic Cardiovascular Control in Paralympic Athletes with Spinal Cord Injury  <b>C. West - #69</b>





10:50	Novel Uses of Electromyography in Evaluation of Skeletal Muscle Recruitment during Exercise in Athletes with Disabilities: a Key to Injury Prevention and Future Classification? <b>P. Runciman - #52</b>
11:10	Relationship between Perceived Shoulder Pain and Kinematic Analysis of Wheelchair Propulsion in Sedentary and Active Wheelchair Users <b>I. Rossignoli - #50</b>
11:30	Nutritional Supplement Habits and Perceptions of Athletes with a Disability: Preliminary Findings <b>T. Graham - #22</b>
12:10 – 13:40	<i>Lunch Break</i>
<b>13:40 – 14:40</b>	<b>SESSION A – FREE COMMUNICATIONS II</b>
VISTA Room 1	<b>Running Prosthesis</b>
13:40	The Impact of Technological Change in Sprinting with a Lowerlimb Amputation <b>B. Dyer - #17</b>
14:00	Impulse Synchronisation of Lower-Limb Running Prosthesis Technology: an Introduction <b>S. Noroozi - #41</b>
14:20	The Science of Coaching: Lessons to be Learned from a Case Study on the Effect of Different Running Blades on Running Performance <b>S. Ferreira - #18</b>
<b>13:40 – 14:40</b>	<b>Session B – Free Communications III</b>
VISTA Room 2	<b>(Classification in) Wheelchair Sports</b>
13:40	Moving Towards Evidence Based Classification in Wheelchair Rugby: Classification of Trunk Impairment in Relation to Static Sitting Balance Measures <b>V. Altmann - #02</b>



14:00	Sprint Performance, Trunk Muscle Strength and Trunk Classification in Wheelchair Rugby and Basketball Athletes. <b>N. Keijsers - #30</b>
14:20	Reliability and Validity of a Wheelchair Rugby Skills Test <b>T. Janssen - #28</b>
14:40 – 15:00	<i>Coffee Break</i>
15:00 – 16:20	<b>SESSION A - INVITED SYMPOSIUM 2</b>
VISTA Room 1	<b>Meeting The Industry</b>