



## Programme iWAVex 2021

Friday, 29th Oct: 13:00-19:00 (CET/Cologne time)

	<b>Opening</b>	
13:00-13:05	Welcome	Eddy van der Zee
13:05-13:15	Introduction	Mario Bernardo-Filho
<b>Session 1</b>	<b>Orthopedics</b>	
13:20-13:40	Whole body vibration in adolescent idiopathic scoliosis	Christina Stark
13:40-14:00	The evaluation of the effects of whole-body vibration exercise on sleep quality in knee osteoarthritis elderly woman: preliminary findings	Márcia Cristina Moura Fernandes
14:00-14:20	The role of dentin matrix protein 1 (DMP1) in low-magnitude high-frequency vibration accelerated osteoporotic fracture healing	Meng Chen Michelle Li
14:20-14:40	Effect of whole-body vibration on bone remodeling and structural organization of nanocomposites in rats with glucocorticoid-induced osteoporosis	Nazar Kostyshyn
14:40-15:00	Immediate effects of whole-body vibration exercise on the hormonal parameters and oxidative biomarkers in sarcopenic older people: controlled and randomized clinical trial	Fabiana Angélica de Paula
15:00-15:20	<i>Break</i>	
<b>Session 2</b>	<b>Cardio-Metabolic Medicine</b>	
15:20-15:40	Effects of single session of whole-body vibration on cardiac troponin I (cTnI), echocardiographic and ambulatory electrocardiographic (Holter) parameters of healthy non-athletic dogs	Ivan Santos
15:40-16:00	Oscillatory whole-body vibration improves exercise capacity and physical performance in pulmonary arterial hypertension: a randomised clinical study	Felix Gerhardt
16:00-16:20	Whole-body vibration training versus conventional balance training in patients with severe chronic obstructive pulmonary disease (COPD) – a randomized, controlled trial	Rainer Gloeckl
16:20-16:40	Cardiopulmonary responses during dynamic squatting exercise with and without whole-body vibration in adolescents	Bruno Alvarenga Soares

16:40-17:00	Effects of whole-body vibration on neck circumference in patients with Metabolic Syndrome - preliminary results	Danubia de Sa-Caputo Revelles Pereira
17:00-17:20	Effects of whole body vibration exercise on serum enzymes activities in diabetic wistar rats	André Bandeira Dionizio Cardoso
17:20-17:40	Whole body vibration added to treatment as usual is effective in juvenile depression though the immunological pathways leave questions open	Heidrun Wunram
<b>17:40-19:00</b>	<b>Poster session</b>	

### Saturday, 30th Oct: 10:00-19:00 (CET/Cologne time)

<b>Session 3</b>	<b>Exercise &amp; Training</b>	
10:00-10:20	Effect of whole-body vibration with static squat exercises, on cerebral oxygenation and executive function in young adults: a near infrared spectroscopy study	Hiromi Imai
10:20-10:40	Co-application of oral magnesium supplementation and low-magnitude, high-frequency vibration treatment attenuates sarcopenia via PI3k/Akt/mTOR pathway	Can Cui
10:40-11:00	Muscular performance is improved by long-term whole-body vibration in comparison to a traditional training program	Yossef Haleva
11:00-11:20	Changes in muscle power following a combined exercise program supplemented with whole-body vibration training in patients with fibromyalgia syndrome: A randomized controlled trial	Horacio Sanchez-Trigo
11:20-11:40	Evaluation of ultrasound data from the MARES Sinusoidal Perturbation Protocol for the analysis of vibration-induced changes in fascicle length and pennation angle as a function of vibration frequency and muscular preload	Nikolas Thier
<b>Special Session</b>	<b>A special iWAVEX contribution</b>	
11:40-12:00	Towards updated guidelines for reporting on whole body vibration research	Marieke J.G. van Heuvelen
12:00-12:20	<i>Break</i>	
<b>Session 4</b>	<b>Pediatrics</b>	
12:20-12:40	The effects of two different frequency protocols of whole-body vibration on spasticity and functional strength and balance in children with cerebral palsy	Punnee Peungsuwan
12:40-13:00	Whole body vibration combined with interval rehabilitation in children with Ataxia	Kyriakos Martakis
13:00-13:20	Is early vibration therapy intervention effective in toddlers with cerebral palsy?	Alena Adaikina

13:20-13:40	Effect of an interval rehabilitation program with home-based, vibration-assisted training on the development of muscle and bone in children with cerebral palsy – an observational study	Ibrahim Duran
13:40-14:00	<i>Break</i>	
<b>Session 5</b>	<b>Neuro-Science</b>	
14:00-14:20	Whole body vibration training: an exercise intervention for the brain?	Eddy van der Zee
14:20-14:40	Whole body vibration improves hippocampal dependent memory, anxiety-like behavior and motor performance in aged rats	Tamás Oroszi
14:40-15:00	Chronic WBV treatment enhances motor and cognitive functions in senescent rats	Csaba Nyakas
15:00-15:20	Whole body vibration restored brain collagen after surgery; associations with neuroinflammation and neurogenesis	Noa Keijzer
15:20-15:40	Short-term effects of side-alternating whole-body vibration on cognitive function of young adults	Y. Laurisa Arenales Arauz
15:40-16:00	<i>Break</i>	
<b>Session 6</b>	<b>Injury &amp; Safety</b>	
16:00-16:20	Whole-body vibration training increases antioxidant biomarker in woman with fibromyalgia	Jousielle Márcia dos Santos
16:20-16:40	Effects of whole body vibration on cutaneous wounds healing in health adult rats	Ivan Santos
16:40-17:00	Predicting human hand-arm vibration syndrome pathogenesis from animal vibration-injury research	Danny A Riley
17:00-17:30	<b>General Discussion &amp; Closing Remarks</b>	

## Poster Session

1. Luiza Torres-Nunes: Effects of whole-body vibration exercise on sleep disorders and clinical parameters in children with Down Syndrome: a pilot study
2. Alessandro dos Santos Pin: WBV contributions in cerebral palsy children's motor function
3. Maria Korman: Stimulate to learn: An advantage in motor learning for young adults with ADHD when afforded background vibratory stimulation
4. Regina Dantas Jales De Oliveira: Effect of Whole-body vibration exercises on bone mineral density and in quality of life of post-menopause women: study protocol for a randomized controlled trial
5. Alessandro dos Santos Pin: WBV and nervous system: clinical effects
6. Gargi Ahuja: Understanding the molecular basis of the effects of WBV on Parkinson's Disease pathology at a cellular level
7. Maria Eduarda De Souza Melo Oliveira: Quality of life assessment of patients with the chronic obstructive pulmonary disease with the Saint George Respiratory Questionnaire after Whole-body vibration exercises: a systematic review
8. Bruno Bessa Monteiro-Oliveira: Acute effects of whole-body vibration exercise on flexibility in individuals with chronic obstructive pulmonary disease: preliminary findings

9. Eliane De Oliveira Guedes De Aguiar: Effect of whole-body vibration exercise on anterior trunk flexion and perceived exertion in patients with chronic obstructive pulmonary disease: an acute intervention
10. Aline Reis Silva: Whole-body vibration exercises could be a strategy to improve body composition and health metabolic in obese individuals? Preliminary results
11. Ana Carolina Coelho-Oliveira: Could whole-body vibration exercise modify the uric acid concentration in individuals with metabolic syndrome? Preliminary results
12. Aline Cristina Gomes Santos: Analysis of the pain level during 5-week of whole-body vibration exercise: preliminary findings
13. Tobias Stephan Kaeding: Whole-body vibration training as a minimal preventive intervention in workplace health promotion: experience from practical studies and a best practice project
14. Christy Donata: Whole-body vibration as a therapeutic intervention for sleep deprivation: An exploratory study
15. EMS Geerts: Whole body vibration improves Alzheimer's disease pathology in the J20 mouse model
16. Ana Clara de Souza Freitas: Whole body vibration and cognition: a systematic review of the effects and possible therapeutic uses
17. Alessandro dos Santos Pin: Medical Applications of Whole Body Vibration (WBV) – Review
18. Tamás Oroszi: Whole Body Vibration, an effective intervention strategy for postoperative recovery?
19. Sofia Tamini: Effects of whole body vibration and maximal voluntary contractions on growth hormone (GH) isoforms in obese adolescents
20. Rondinele Santos da Silva: Effects of the mechanical vibration generated on a vibrating platform in the section injuries of biceps brachial total and partial caused by opening ribbon of the windows in military airway activity