Thomas Seacrist

List of Publications by Year
in descending order

44 papers	571 citations	687363 13 h-index	752698 20 g-index
44 all docs	44 docs citations	44 times ranked	507 citing authors

#	Article	IF	Citations
1	Comparison of kinematic responses of the head and spine for children and adults in low-speed frontal sled tests. Stapp Car Crash Journal, 2009, 53, 329-72.	1.1	56
2	Passive cervical spine flexion: The effect of age and gender. Clinical Biomechanics, 2012, 27, 326-333.	1.2	35
3	Chest Compression Quality Over Time in Pediatric Resuscitations. Pediatrics, 2013, 131, e797-e804.	2.1	32
4	Transporting Children in Autonomous Vehicles: An Exploratory Study. Human Factors, 2020, 62, 278-287.	3.5	31
5	Analysis of near crashes among teen, young adult, and experienced adult drivers using the SHRP2 naturalistic driving study. Traffic Injury Prevention, 2018, 19, S89-S96.	1.4	29
6	Effects of Hydrostatic Loading on a Self-Aggregating, Suspension Cultureâ€"Derived Cartilage Tissue Analog. Cartilage, 2011, 2, 254-264.	2.7	28
7	Importance of Muscle Activations for Biofidelic Pediatric Neck Response in Computational Models. Traffic Injury Prevention, 2013, 14, S116-S127.	1.4	26
8	Comparison of Kinematic Responses of the Head and Spine for Children and Adults in Low-Speed Frontal Sled Tests. , 0, , .		25
9	Near crash characteristics among risky drivers using the SHRP2 naturalistic driving study. Journal of Safety Research, 2020, 73, 263-269.	3.6	23
10	Kinetics of the cervical spine in pediatric and adult volunteers during low speed frontal impacts. Journal of Biomechanics, 2012, 45, 99-106.	2.1	20
11	Occupant Kinematics and Shoulder Belt Retention in Far-Side Lateral and Oblique Collisions: A Parametric Study. , 0, , .		19
12	Advanced driver assistance systems for teen drivers: Teen and parent impressions, perceived need, and intervention preferences. Traffic Injury Prevention, 2018, 19, S120-S124.	1.4	18
13	Comparison of crash rates and rear-end striking crashes among novice teens and experienced adults using the SHRP2 Naturalistic Driving Study. Traffic Injury Prevention, 2016, 17, 48-52.	1.4	17
14	Occupant kinematics and shoulder belt retention in far-side lateral and oblique collisions: a parametric study. Stapp Car Crash Journal, 2013, 57, 343-85.	1.1	17
15	Effect of automated versus manual emergency braking on rear seat adult and pediatric occupant precrash motion. Traffic Injury Prevention, 2019, 20, S106-S111.	1.4	16
16	The effect of vehicle countermeasures and age on human volunteer kinematics during evasive swerving events. Traffic Injury Prevention, 2020, 21, 48-54.	1.4	15
17	Efficacy of automatic emergency braking among risky drivers using counterfactual simulations from the SHRP 2 naturalistic driving study. Safety Science, 2020, 128, 104746.	4.9	14
18	Analysis of spinal motion and loads during frontal impacts. Comparison between PMHS and ATD. Annals of Advances in Automotive Medicine, 2010, 54, 61-78.	0.6	14

#	Article	IF	Citations
19	Simulated Driving Performance, Self-Reported Driving Behaviors, and Mental Health Symptoms in Adolescent Novice Drivers. Nursing Research, 2018, 67, 202-211.	1.7	12
20	Pediatric Head and Neck Dynamics in Frontal Impact: Analysis of Important Mechanical Factors and Proposed Neck Performance Corridors for 6- and 10-Year-Old ATDs. Traffic Injury Prevention, 2014, 15, 386-394.	1.4	11
21	Electromyography responses of pediatric and young adult volunteers in low-speed frontal impacts. Journal of Electromyography and Kinesiology, 2013, 23, 1206-1214.	1.7	10
22	Advanced driver assistance systems for teen drivers: A national survey of teen and parent perceptions. Traffic Injury Prevention, 2018, 19, S84-S90.	1.4	10
23	The effect of pretensioning and age on torso rollout in restrained human volunteers in far-side lateral and oblique loading. Stapp Car Crash Journal, 2012, 56, 443-67.	1.1	10
24	Evaluation of Pediatric ATD Biofidelity as Compared to Child Volunteers in Low-Speed Far-Side Oblique and Lateral Impacts. Traffic Injury Prevention, 2014, 15, S206-S214.	1.4	9
25	Kinematic Comparison of Pediatric Human Volunteers and the Hybrid III 6-Year-Old Anthropomorphic Test Device. Annals of Advances in Automotive Medicine, 2010, 54, 97-108.	0.6	9
26	Evaluation of a Risk Awareness Perception Training Program on Novice Teen Driver Behavior at Left-Turn Intersections. Transportation Research Record, 2015, 2516, 15-21.	1.9	7
27	Characterization of the motion of booster-seated children during simulated in-vehicle precrash maneuvers. Traffic Injury Prevention, 2019, 20, S75-S80.	1.4	7
28	In-depth analysis of crash contributing factors and potential ADAS interventions among at-risk drivers using the SHRP 2 naturalistic driving study. Traffic Injury Prevention, 2021, 22, S68-S73.	1.4	7
29	Evaluation of the Hybrid III and Q-Series Pediatric ATD Upper Neck Loads as Compared to Pediatric Volunteers in Low-Speed Frontal Crashes. Annals of Biomedical Engineering, 2013, 41, 2381-2390.	2.5	6
30	Forensic analysis of crib mattress properties on pediatric CPR qualityâ€"Can we balance pressure reduction with CPR effectiveness?. Resuscitation, 2013, 84, 1131-1136.	3.0	6
31	Synthetic Muscle electroactive polymer (EAP) based actuation and sensing for prosthetic and robotic applications. , 2018, , .		6
32	The Effect of Pretensioning and Age on Torso Rollout in Restrained Human Volunteers in Far-Side Lateral and Oblique Loading. , 0, , .		5
33	Simulated Driving Assessment: Case Study for the Development of Drivelab, Extendable Matlabâ„¢ Toolbox for Data Reduction of Clinical Driving Simulator Data. , 0, , .		4
34	Comparison of Q3s ATD Biomechanical Responses to Pediatric Volunteers. Traffic Injury Prevention, 2014, 15, S215-S222.	1.4	3
35	A Methodology to Estimate the Kinematics of Pediatric Occupants in Frontal Impacts. Traffic Injury Prevention, 2012, 13, 393-401.	1.4	2
36	Experience and Skill Predict Failure to Brake Errors: Further Validation of the Simulated Driving Assessment. , 0, , .		2

#	Article	IF	Citations
37	LiveMetrics: Providing Individualized Feedback on Driving Performance. , 2015, , .		2
38	Age Differences in Occupant Motion during Simulated In-Vehicle Swerving Maneuvers. International Journal of Environmental Research and Public Health, 2020, 17, 1834.	2.6	2
39	Laboratory assessment of a head impact sensor for youth soccer ball heading impacts using an anthropomorphic test device. Proceedings of the Institution of Mechanical Engineers, Part P: Journal of Sports Engineering and Technology, 2024, 238, 36-43.	0.7	2
40	Modeling spatial trajectories in dynamics testing using basis splines: application to tracking human volunteers in low-speed frontal impacts. Computer Methods in Biomechanics and Biomedical Engineering, 2016, 19, 1046-1052.	1.6	1
41	Vehicle Automation Emergency Scenario: Using a Driving Simulator to Assess the Impact of Hand and Foot Placement on Reaction Time. , 0, , .		1
42	Kinematic Comparison of the Hybrid III and Q-Series Pediatric ATDs to Pediatric Volunteers in Low-Speed Frontal Crashes. Annals of Advances in Automotive Medicine, 2012, 56, 285-98.	0.6	1
43	Biofidelic Evaluation of the Large Omni-Directional Child Anthropomorphic Test Device in Low Speed Loading Conditions. Stapp Car Crash Journal, 2019, 63, 213-234.	1.1	1
44	Synthetic Muscleâ„¢ for Deep Space Travel and Other Applications on Earth and in Space. , 2022, , 1-48.		0