

הנדך מוזמן/ת להרצאה סמינריונית של הפקולטה להנדסת מכונות שתתקיים ביום ה' 28.02.2019  
(כג' באדר א', תשע"ט), בניין דן קאהן, אודיטוריום 1, 13:30.

**מרצה :** תומר ברקוביץ

**מנחה :** פרופ' ח אלון וולף

**על הנושא :**

## **Plantar Pressure and Center of Pressure Curve alterations due to Running Induced Fatigue**

The seminar will be given in Hebrew

**תקציר ההרצאה :**

Lower extremity kinematic alterations have been shown to occur due to running-induced fatigue. It has yet to be shown that running-induced fatigue will also cause alterations in both the plantar-pressure map and foot center of pressure (CoP) trajectory. The purpose of this study was to assess plantar pressure and CoP trajectory alterations after a 30-minute run at sub-maximal speed with experienced long-distance runners. An alteration of the plantar-pressure map and CoP trajectory were demonstrated post 30-minute exhausting run and may imply abnormal loads and increased joint and tissues stresses during a fatigued state. In this study we also propose a concept for a low cost in-shoe pressure measuring insole based on the results of our study with the purpose of measuring the initiation of running induced fatigue. These alterations may be conducive to an overuse injury, and caution should be taken in instances in which there is a high probability of achieving a fatigued state, such as high-intensity training sessions or races. Results of the present study may contribute to factors influencing footwear design to prevent or decrease instances of specific running-related injuries or lower-limb pathologies.

בברכה,

פרופ' א"א אתיון סאס  
מרכז הסמינרים