

Shai Carmi- publications

1. Shai Carmi, Erez Y. Levanon, Shlomo Havlin, and Eli Eisenberg. "Connectivity and expression in protein networks: Proteins in a complex are uniformly expressed". *Phys. Rev. E* **73**, 031909 (2006).
2. Shai Carmi, Reuven Cohen, and Danny Dolev. "Searching complex networks efficiently with minimal information". *Europhys. Lett.* **74**, 1102 (2006).
3. Eduardo Lopez, Shai Carmi, Shlomo Havlin, Sergey Buldyrev, and H. Eugene Stanley. "Anomalous electrical and frictionless flow conductance in complex networks". *Physica D* **224**, 69-76 (2006).
4. Shai Carmi, Zhenhua Wu, Eduardo Lopez, Shlomo Havlin, and H. Eugene Stanley. "Transport between multiple users in complex networks". *Eur. Phys. J. B* **57**, 165-174 (2007).
5. Shai Carmi, Shlomo Havlin, Scott Kirkpatrick, Yuval Shavitt, and Eran Shir. "A Model of Internet topology using k -shell decomposition", *P. Natl. Acad. Sci. USA* **104**, 11150-11154 (2007).
6. Eduardo Lopez, Roni Parshani, Reuven Cohen, Shai Carmi, and Shlomo Havlin. "Limited path percolation in complex networks". *Phys. Rev. Lett.* **99**, 188701-188704 (2007).
7. Michalis Maragakis, Shai Carmi, Daniel ben-Avraham, Shlomo Havlin, and Panos Argyrakis. "Priority diffusion model in lattices and complex networks". *Phys. Rev. E (Rapid Communication)* **77**, 020103-020106 (2008).
8. Shai Carmi, Zhenhua Wu, Shlomo Havlin, and H. Eugene Stanley. "Transport in networks with multiple sources and sinks." *EPL* **84**, 28005 (2008).
9. Aristotelis Kittas, Shai Carmi, Shlomo Havlin, and Panos Argyrakis. "Trapping in complex networks." *EPL* **84**, 40008 (2008).
10. Shai Carmi, P. L. Krapivsky, and Daniel ben-Avraham, "Partition of networks into basins of attraction." *Phys. Rev. E* **78** 066111 (2008).
11. Shai Carmi, Erez. Y. Levanon, and Eli Eisenberg. "Efficiency of complex production in changing environment." *BMC Sys. Biol.* **3**:3 (2009).
12. Shai Carmi, Shlomo Havlin, Chaoming Song, Kun Wang, and Hernan Makse. "Energy-landscape network approach to the glass transition." *J. Phys. A: Math. Theor.* **42**, 105101 (2009).
13. Shai Carmi, Stephen Carter, Jie Sun, and Daniel ben-Avraham. "Asymptotic behavior of the Kleinberg model". *Phys. Rev. Lett.* **102**, 238702 (2009).
14. Lior Turgeman, Shai Carmi, and Eli Barkai. "Fractional Feynman-Kac equation for non-Brownian functionals". *Phys. Rev. Lett.* **103**, 190201 (2009).
15. Hanoch Goldshmidt, Devorah Matas, Anat Kabi, Shai Carmi, Ronen Hope, and Shulamit Michaeli. "Persistent ER stress induces the Spliced Leader RNA Silencing pathway (SLS), leading to programmed cell death in *Trypanosoma brucei*". *PLoS Pathog.* **6**, e1000731 (2010).

16. Roni Parshani, Shai Carmi, and Shlomo Havlin. "Epidemic threshold for the Susceptible-Infectious-Susceptible model on random networks". *Phys. Rev. Lett.* **104**, 258701 (2010).
17. Nikolay G. Kolev, Joseph B. Franklin, Shai Carmi, Huafang Shi, Shulamit Michaeli, and Christian Tschudi. "The transcriptome of the human pathogen *Trypanosoma brucei* at single-nucleotide resolution". *PLoS Pathog.* **6**, e1001090 (2010).
18. Shai Carmi, Lior Turgeman, and Eli Barkai. "On distributions of functionals of anomalous diffusion paths". *J. Stat. Phys.* **141**, 1071 (2010).
19. Shai Carmi, Itamar Borukhov, and Erez Y. Levanon. "Identification of widespread ultra-edited human RNA". *PLoS Genet.* **7**, e1002317 (2011).
20. Shai Carmi, George M. Church, and Erez Y. Levanon. "Large scale DNA editing of retrotransposons accelerates mammalian genome evolution". *Nat. Commun.* **2**, 519 (2011).
21. Shai Carmi and Eli Barkai. "Fractional Feynman-Kac equation for weak ergodicity breaking". *Phys. Rev. E* **84**, 061104 (2011).
22. Sachin Kumar Gupta, Shai Carmi, Hiba Waldman Ben-Asher, Itai Dov Tkacz, Ilana Naboishchikov, and Shulamit Michaeli. "Basal splicing factors regulate the stability of mature mRNAs in Trypanosomes" *J. Biol. Chem.* **7**, 4991 (2013).
23. Shai Carmi, Pier Francesco Palamara, Vladimir Vacic, Todd Lencz, Ariel Darvasi, and Itsik Pe'er. "The variance of identity-by-descent sharing in the Wright-Fisher model". *Genetics* **193**, 911 (2013).
24. Sachin Kumar Gupta, Idit Kosti, Guy Plaut, Asher Pivko, Dipul Biswas, Chaim Wachtel, Hiba Waldman Ben-Asher, Shai Carmi, Fabian Glaser, Yael Mandel-Gutfreund, and Shulamit Michaeli. "The hnRNP F/H homologue of *Trypanosoma brucei* is differentially expressed in the two life cycle stages of the parasite and regulates splicing and mRNA stability". *Nucleic Acids Res.* (in press, 2013).

Book chapters

1. Shai Carmi and Eli Barkai. "Fractional Feynman-Kac equation for anomalous diffusion functionals". Chapter 8 in "Fractional Dynamics: Recent Advances", Eds. Joseph Klafter, S. C. Lim, and Ralf Metzler (World Scientific, 2011).