

# NIV DAYAN

## PERSONAL INFORMATION

*email*                   nivdayan@gmail.com  
*website*                nivdayan.github.io

## EDUCATION & ACADEMIC EMPLOYMENT

<i>Harvard University</i>	<i>2015–current</i>	Postdoc in Computer Science Goal: To Identify the Best Possible Space-Time Trade-Offs for Log-Structured Data Structures Advisor: Stratos Idreos
<i>IT University of Copenhagen</i>	<i>2012–2015</i>	PhD in Computer Science Thesis: Modelling and Managing SSD Write-Amplification. Advisor: Philippe Bonnet
<i>IT University of Copenhagen</i>	<i>2010–2012</i>	MSc in Software Development and Technology Thesis: Predictable I/Os and Efficient B-Tree Updates on Flash-Based Solid State Drives. Advisor: Philippe Bonnet
<i>University of Dundee</i>	<i>2007–2010</i>	BSc in Computing and Economics

## AWARDS

*ACM SIGMOD 2018*                   **Best of ACM SIGMOD.** Our paper on Monkey: Optimal Navigable Key-Value Store was selected as one of the (4) best papers of the ACM SIGMOD International Conference on Management of Data.

## SELECTED PUBLICATIONS

<i>ACM SIGMOD 2018</i>	Dostoevsky: Better Space-Time Trade-Offs for LSM-Tree Based Key-Value Stores via Adaptive Removal of Superfluous Merging. <b>Niv Dayan</b> , Stratos Idreos.
<i>VLDB 2018</i>	Coconut: A Scalable Bottom-Up Approach for Building Data Series Indexes. Haridimos Kondylakis, <b>Niv Dayan</b> , Kostas Zoumpatianos, Themis Palpanas.
<i>ACM SIGMOD 2017</i>	Monkey: Optimal Navigable Key-Value Store. <b>Niv Dayan</b> , Manos Athanassoulis, Stratos Idreos.
<i>ACM SIGMOD 2017</i>	Data Canopy: Accelerating Exploratory Statistical Analysis. Abdul Wasay, Xinding Wei, <b>Niv Dayan</b> , Stratos Idreos.
<i>ACM SIGMOD 2016</i>	GeckoFTL: Scalable Flash Translation Techniques for Very Large Flash Devices. <b>Niv Dayan</b> , Philippe Bonnet, Stratos Idreos.
<i>Birte@VLDB 2016</i>	Past and Future Steps for Adaptive Storage Data Systems: From Shallow to Deep Adaptivity. Stratos Idreos, Manos Athanassoulis, <b>Niv Dayan</b> , Demi Guo, Mike S. Kester, Lukas Maas, Kostas Zoumpatianos.
<i>Demo@VLDB 2013</i>	EagleTree: Exploring the Design Space of SSD-Based Algorithms. <b>Niv Dayan</b> , Martin Kjaer Svendsen, Matias Bjoerling, Philippe Bonnet, Luc Bouganim.
<i>CIDR 2013</i>	The Necessary Death of the Block Device Interface. Matias Bjoerling, Philippe Bonnet, Luc Bouganim, <b>Niv Dayan</b> .

## SOFTWARE

2012 - 2015      EagleTree - SSD Simulator  
Simulation framework for analyzing the behavior of SSDs, available at  
<https://github.com/ClydeProjects/EagleTree>.

## TEACHING

<i>Harvard University</i>	2018	Teaching Assistant in MSc Course on Data Science
<i>Harvard University</i>	2017	Teaching Assistant in BSc Course on Data Systems
<i>Harvard University</i>	2017	Teaching Assistant in MSc Course on Data Science
<i>Harvard University</i>	2016	Teaching Assistant in BSc Course on Data Systems
<i>Harvard University</i>	2016	Teaching Assistant in MSc Course on Data Science
<i>IT University of Copenhagen</i>	2014	Teaching Assistant in MSc Course on Database Tuning
<i>IT University of Copenhagen</i>	2009	Teaching Assistant in BSc Course on Data Structures

## WORK EXPERIENCE

<i>Podio, Denmark</i>	2012	Data Analyst
<i>Sunstone Capital, Denmark</i>	2012	Data Analyst
<i>Netmester, Denmark</i>	2011-2012	Web Developer
<i>Academia Sinica, Taiwan</i>	2010	Research Intern
<i>Calico Jack, Scotland</i>	2009	Web Developer
<i>SIIT, Thailand</i>	2008	Research Intern

## OTHER INFORMATION

*Interests*            guitar-playing · song-writing · science fiction · Brazilian Jiu Jitsu  
*Languages*        English · Hebrew · Danish

April 22, 2018