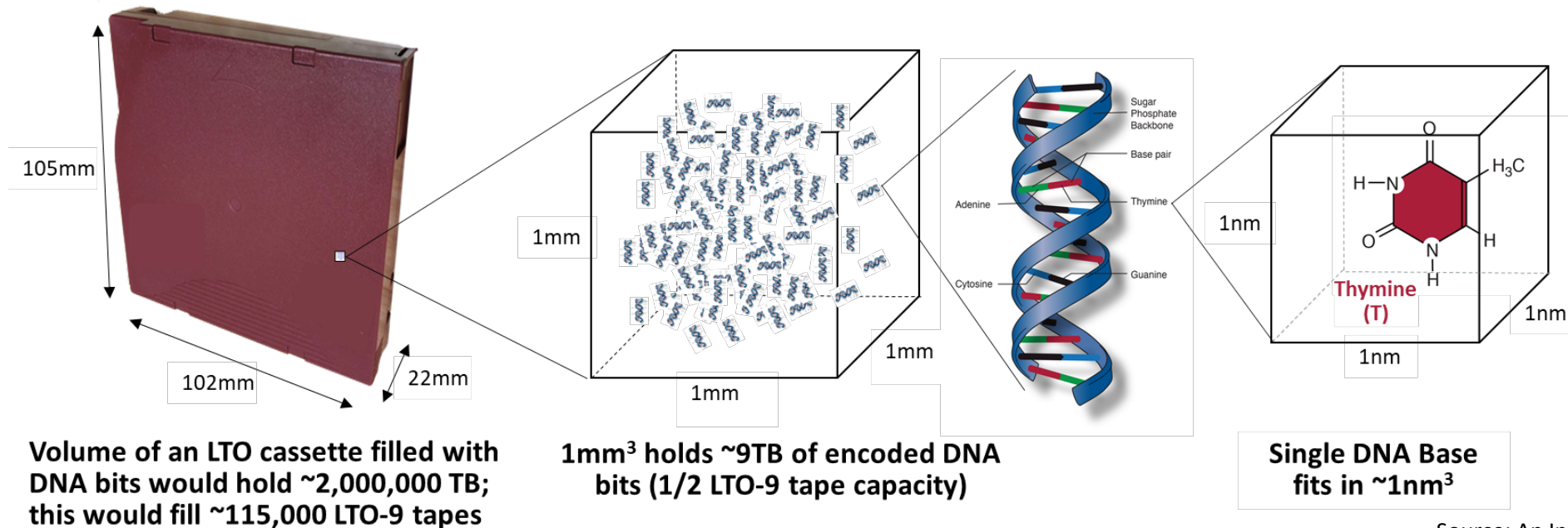


DNA Data Storage Track: Quenching the thirst for digitization

Dave Landsman
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Why DNA?

DNA bits are really small



Source: An Introduction to DNA Data Storage - DNA Data Storage Alliance

... and they last a long time, and are easy to store, and don't need to be migrated (= TCO)
... and they'll accelerate and benefit from established investment in DNA technologies

But there are still questions

- Is there really a need for a medium as dense as DNA?
- Can we scale the underlying technologies?

Our Track Today

		Talk Title	Talk Abstract
Aaron Ogus	Distinguished Engineer Microsoft	The looming need for molecular storage	Sets stage for why existing storage technologies will be overwhelmed and molecular storage needed.
Steffen Hellmold	VP BD, DNA Data Storage Twist Bioscience	DNA Data Storage at Scale	Overview of DNA data storage pipeline and advances in synthesis write density on Si.
Devasier Bennet	Postdoc University of Arizona	Preservation of DNA for Information Storage	Study on DNA preservation in storage application.
BREAK			
Boyan Boyanov	Senior Principal Scientist Illumina	DNA Sequencing at Scale	Fundamentals of ultra-high throughput DNA sequencing; update on sequencing scaling trends.
Alessia Marelli	CTO DNAalgo	DNAssim: A Full System Simulator for DNA Storage	DNAssim, a simulator which models the error characteristics of a DNA pipeline.
Q&A			

DNA Data Storage Alliance



History

- Formed Oct-2020 by Twist Bioscience, Microsoft, Illumina, and Western Digital
- Grew to 60+ members by 2Q-2022
- Joined SNIA as a Technology Affiliate group as of Jun-2022

Mission

- Create and promote an interoperable storage ecosystem based on DNA as a data storage medium

Scope

- Educate the market to create awareness and adoption of DNA data storage
- Guide investment and research directions in DNA data storage
- Develop DNA data storage standards as needed by the ecosystem

See us at www.dnastoragealliance.org



THANK YOU