

# Creating a market for your tech

Kalle Raita



**What's in common? What's different?**



# Who am I?

Kalle Raita

Business-to-business software industry operative, software engineer by training.  
Master's from Computer Science at TKK.

2018-	Curious AI, VP of Sales: defining AI tech products and selling them
2014-2017	Google, Sr. Software Engineer: integrating drawElements tech
2010-2014	drawElements, CEO: CEO-ing, sales, product definition of GPU test software
2005-2010	NVIDIA Helsinki: Systems Software Engineer
2001-2004	Hybrid Graphics: Software Engineer
<earlier>	Hobbyist programming, gaming

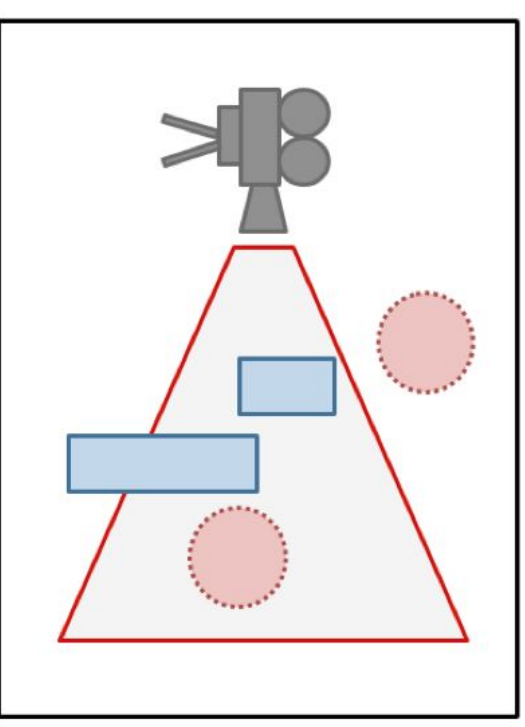
# The Stories

# dpVS and SPVS

Technology to speed up game rendering by automatically detecting which objects are visible. This allows more compute resources to be spent in visible parts. Leads to prettier graphics.

Market for game developer tools existed, but for visibility optimization not.

Serious traction when massive online games happened. Currently operates as company called Umbra.



# Mobile 3D Graphics



Look at that beauty! Nokia 3410 from 2002. Small B&W screen. With software rendered 3D graphics, because some at Nokia and Hybrid Graphics folks thought there was the future.

Hybrid Graphics created a set of programming libraries that allowed efficient rendering of 3D on the CPU. Pre-integrated, portable package enabled handset vendors to check feature box for 3D graphics.

Multiple programming interface standards were developed to create an ecosystem of technology providers, device vendors, and content creators. 15 years later we have hardware accelerated 3D in all devices. Mobile gaming has become a significant market.

# drawElements Quality Program

Year 2010. The mobile graphics market had matured a bit. A lot of SW depended on the graphics layer.

There was no measure for the reliability before drawElements Quality Program.

Successful productization of technical quality assurance for tech providers like ARM, Qualcomm,...

Standards defined a market for the product.

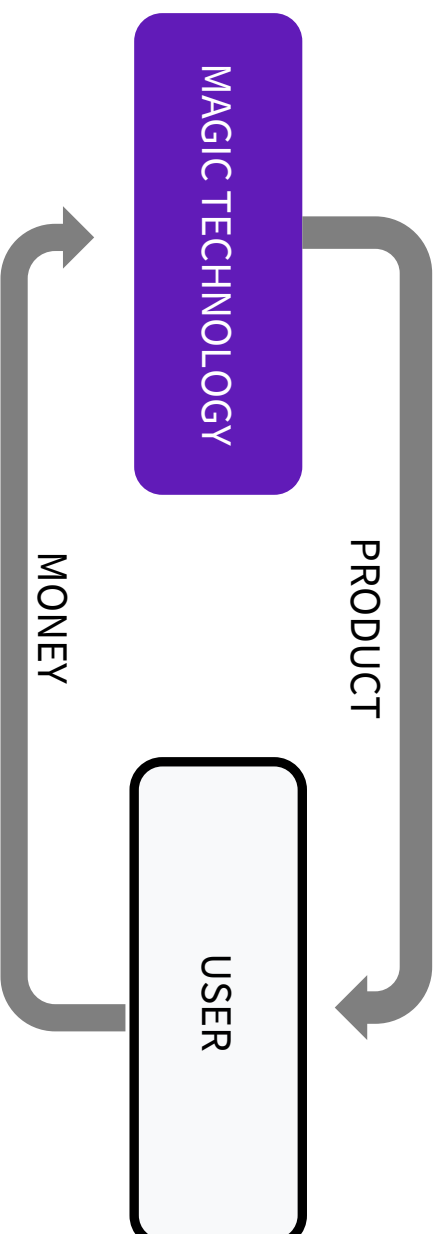
Google acquired the technology in 2014 to bolster Android phone quality assurance.



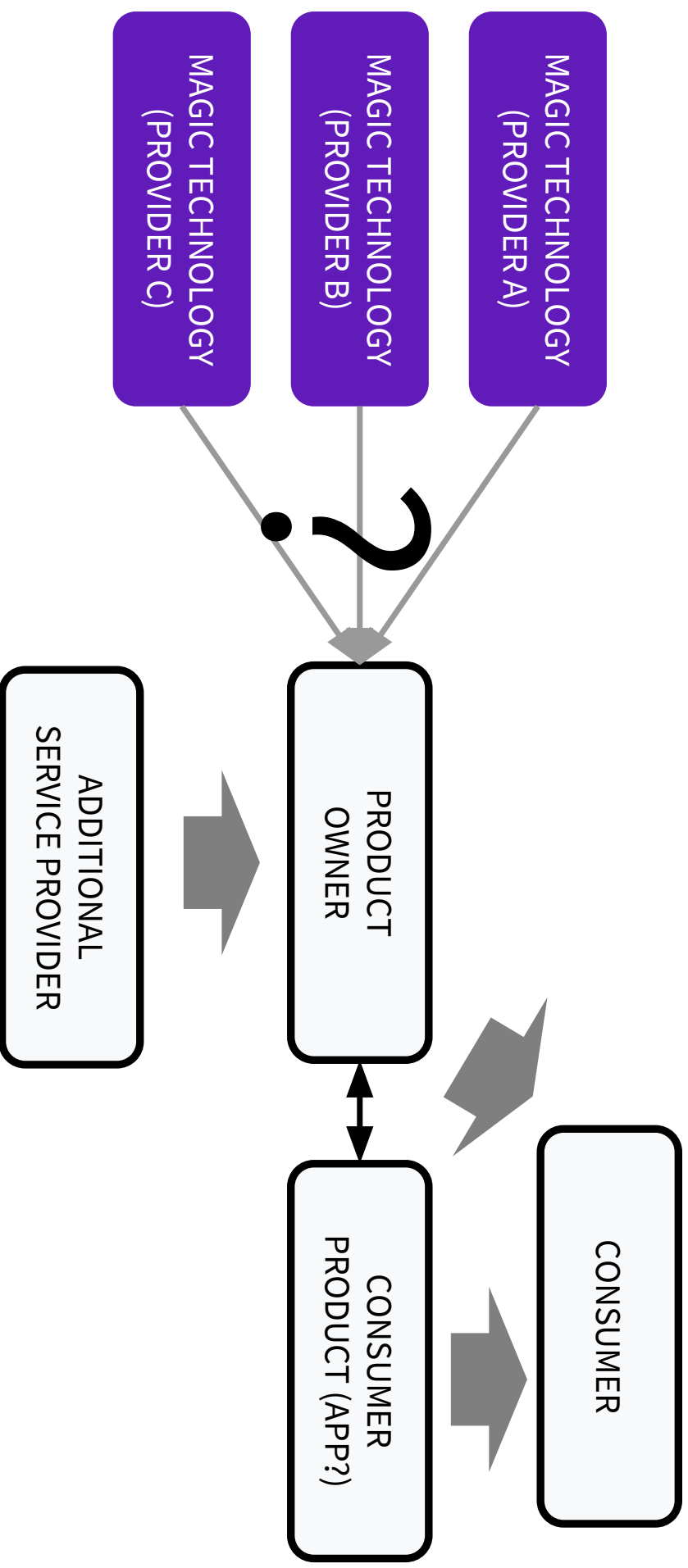
**Lessons learned,  
maybe**



# Ecosystem



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# Pricing

How to decide on the price when you are opening a new market?

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**(Implementing cost / minimum number of customers) plus profit margin.**

Worked great for drawElements. Likely to undercut alternative internal implementation cost.

**Price of budget competition?**

What's the closest thing to your product? Does it compete of the same budget at buyer?

**Value created?**

Value created is very hard to argue with new tech. Pricing usually needs to be discussed at the start of business relationship. Maybe circumventable with Proof-of-Concepts.

# **Sales & Marketing**

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**Convincing customer may require try-before-you-buy**

Careful with technical sales effort required. White papers, small samples help.

**Prove the technical competence of the team**

Both Hybrid and drawElements participated in relevant technical standardization. Partly to influence, partly to show of the technical competence & relevance.

**Trade shows probably waste of time**

For example, for me Mobile World Congress has been mostly a dudd. Get meetings pre-booked in connection of a major event.

**Tha-tha-that's  
all, folks!**

# Image sources

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