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■**Thread.**

Published a new essay: The red flags and magic numbers that investors look for in your startup's metrics – 80 slide deck included!


This was a deck that I created on my (longish) interview process with @a16z. It was a long path, starting with meeting folks at the firm 10 years ago. But the purpose of the deck was to explain how I would use my superpower in an investing context

Here's what I explain in the deck. As investors (whether angel or VC) we're often confronted with an up-and-to-the-right graph. Is it going to go up? Or down?

Monthly Active Users
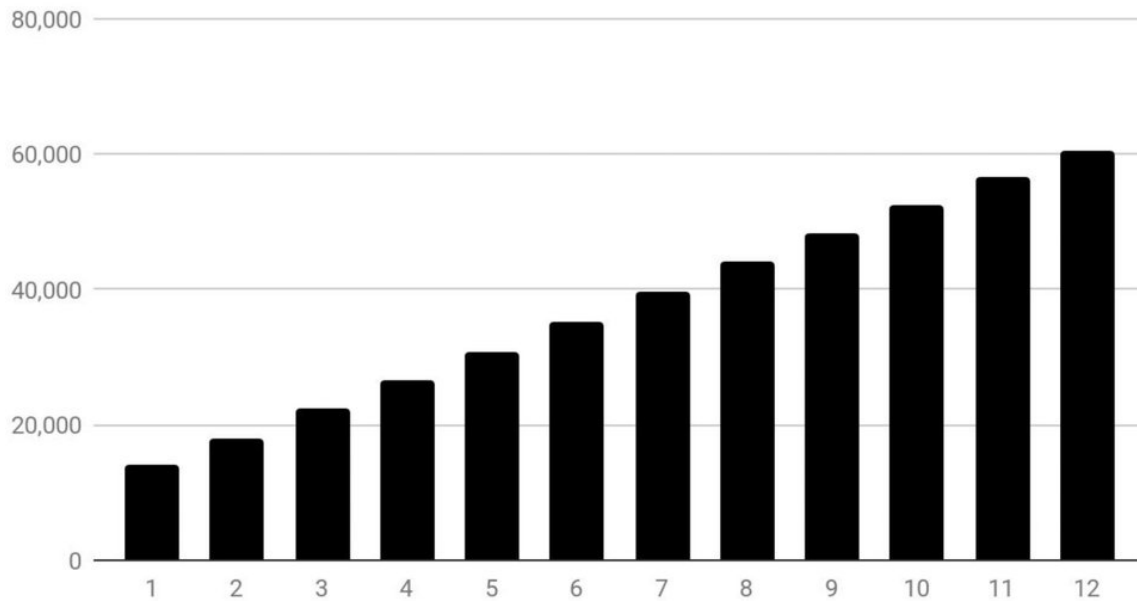
One solution to forecast these growth curves is the Growth Accounting Framework, where you add up New+Reactivated and subtract churned users. In each time period that gives you the difference in monthly actives.

The Growth Accounting Framework

+	New+Reactivated	5,000
-	Inactive	1,000
=	**Net MAU**	**4,000**
+	Engaged	10,000
=	MAU	14,000

The problem with this is that it's a lagging metric, not a leading one. We need to go one level deeper and look at the underlying loops that drive these numbers, to understand the quality.

Problem: Growth Accounting gives <u>lagging metrics</u>
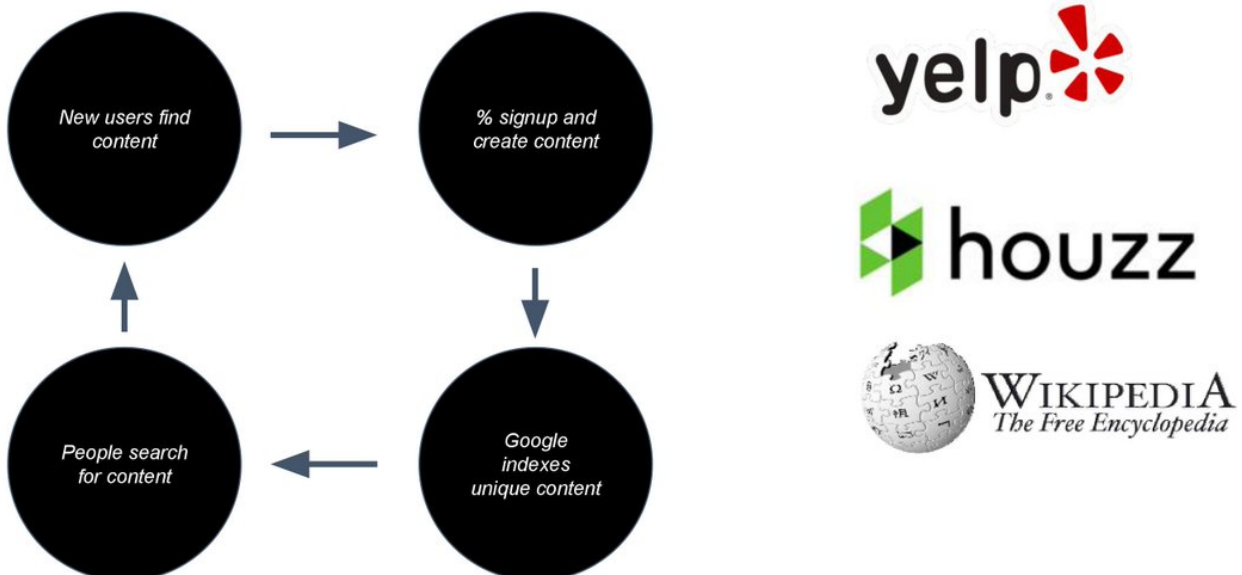
It's just the current snapshot!

You wouldn't invest based on a startup's P&L, Balance Sheet, etc.

Same with Growth Accounting - it talks outputs but not inputs
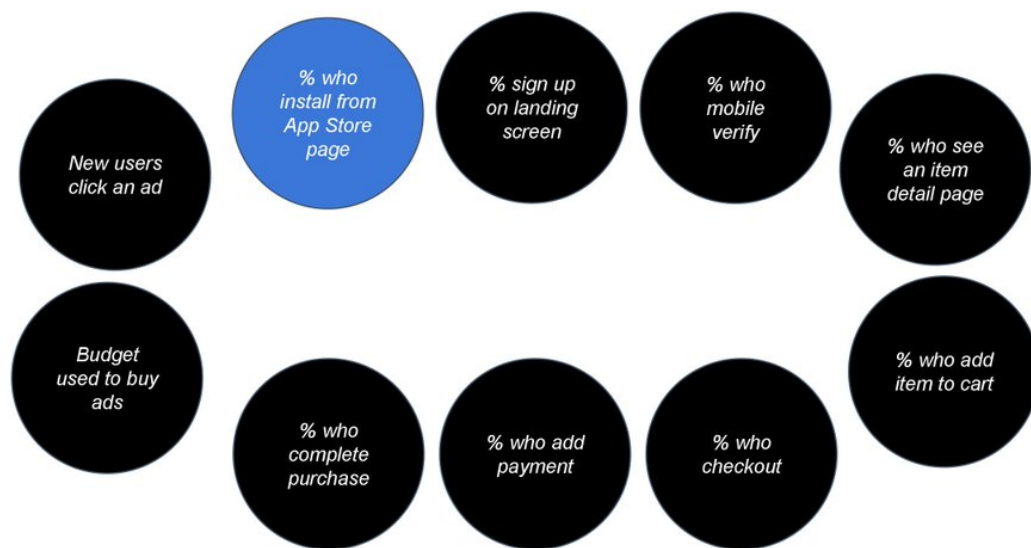
Not actionable for product teams

For acquisition loops, I go through a number of different models. SEO+UGC, Viral, and Paid marketing.

Acquisition Loop: User generated content + SEO

In the deck, I break down how to get more granular on each step, and case studies for how to optimize the loop.d

Paid Marketing Loop - in more detail

From a metrics standpoint, it's important to analyze the acquisition mix, the quality of the signups, and the platform dependencies. In the deck, I talk through a bunch of the red flags I'm looking for.

Loops/Channels Mix

Signups broken down by:
- Channels and Loops
- Time period

Quality indicators
- Proprietary channels and loops
- Repeatable/scalable loops
- Low platform risk
- 33/33/33 on organic plus two loops

Red flags
- New, unsustainable traffic
- Spiky acquisition - ads?
- Brittle dependence on one loop
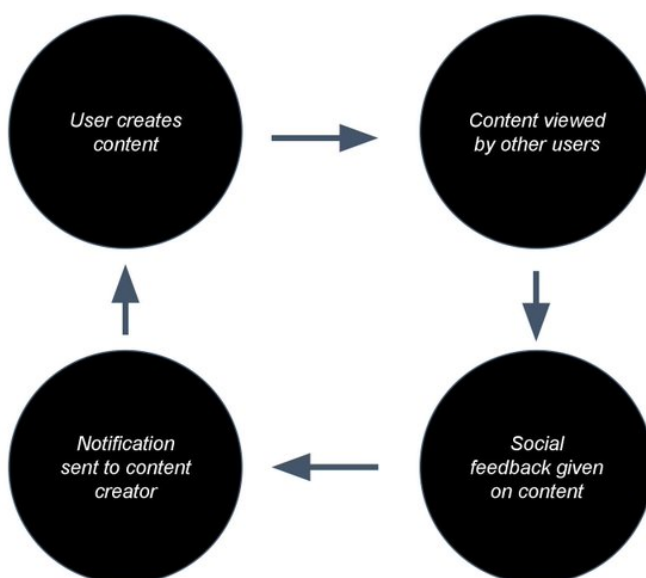- Loops that are actually linear channels

	Dec	Jan	Feb	Mar	Apr
brand / Google					1,000
non-brand / Google				10,000	10,000
seo / Google	10,000	10,500	11,025	11,576	12,155
homepage / Organic	2,000	2,100	2,200	2,300	2,400
product hunt / Partner		25,000	2,000	1,000	500

I go through the same discussion for the Engagement Loop too. Examples, Upside, Metrics, and Forecasting.

Examples of Engagement Loops

Engagement Loop Metrics

Engagement Loop Improvements

Applying the Frameworks
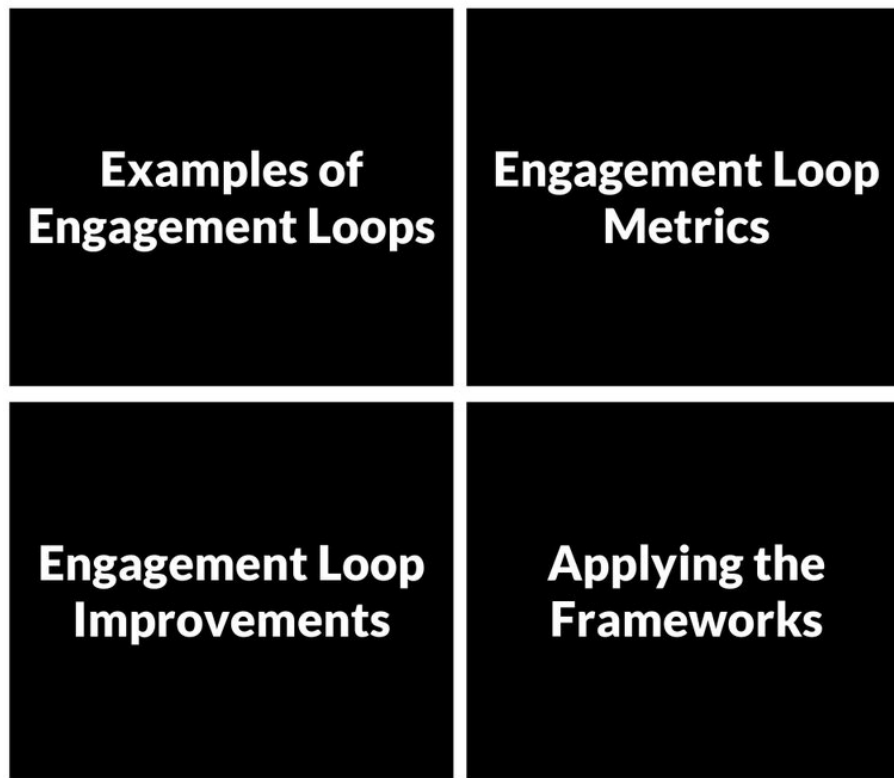
Two kinds of engagement loops- Social Feedback and Content Personalization. There's obviously many others, but these are two that are particularly useful to think about.

Engagement Loop: Social feedback

User creates content → Content viewed by other users

Notification sent to content creator ← Social feedback given on content

Instagram

Linked in

M Gmail

I use examples from Pinterest, Twitter, and Uber. Both increasing the activation of users to get them pinning more, how to build a network, and unblocking users who've lost their password.
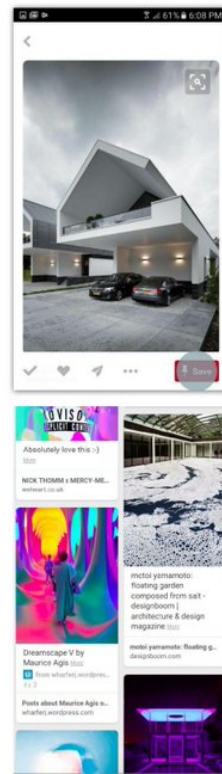
Kicking off the engagement loop

Activation bends the cohort curve early

Examples from Pinterest's growth team:

- "Save" instead of "Pin It"
- Interstitial from Mobile web to app
- Pin Education
- Simplifying Home Feed

+100% lift to activation
(Weekly repinners / Signups)

From a metrics perspective on engagement loops, I'll look at cohort retention curves, frequency analyses, and analyzing notifications too. I don't mention it, but the Power User Curve is important too: https://t.co/kdgO8PIspq

Cohort Retention

Loops versus Linear
- Don't want one-time spikes in retention
- What value is created on each visit?
- Are the loops improving over time?

Actions, not just sessions
- Not just a session!
- D1/D7/D30 and month-to-month
- Segment by acq source, geo, etc

What I'm looking for:
- Active/Reg flattens out to >20%
- TAM * 2y cohort * ARPU
- Inactives aren't viral! Key to acquisition too

Retention Curves for Android Apps
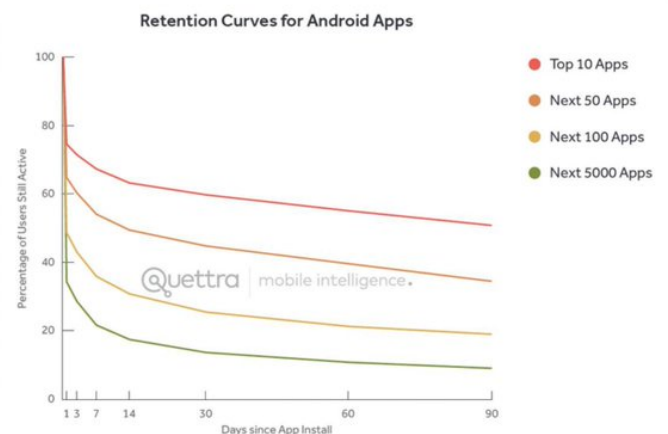
Once you have the Acquisition and Engagement Loops mapped out, and the potential upside, then you can build a forecast for MAUs. This lets you answer the questions you want to answer - where will this curve go?

Hope you enjoy the deck! Again, here's the link:
https://t.co/Kp7YSHTTs6