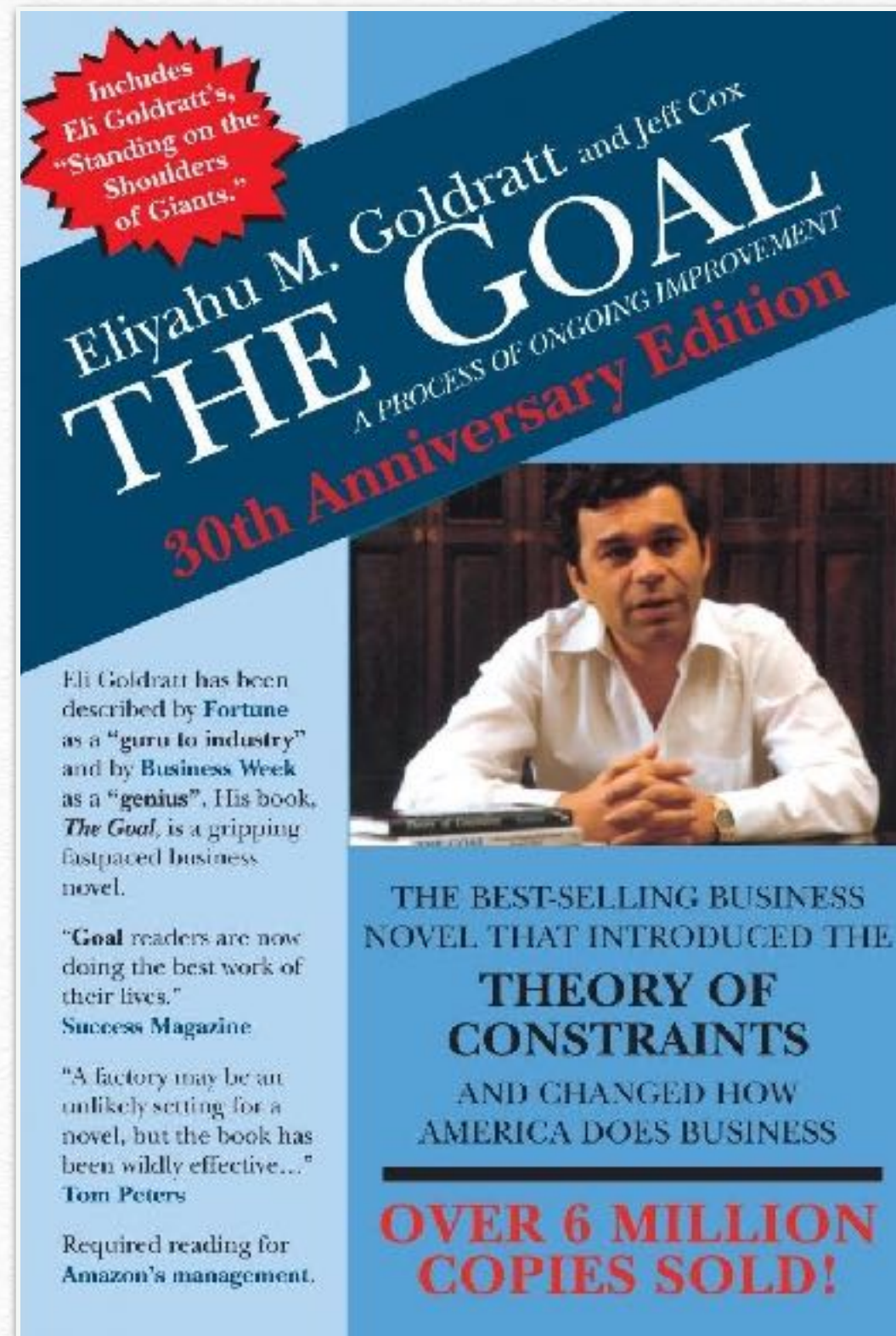


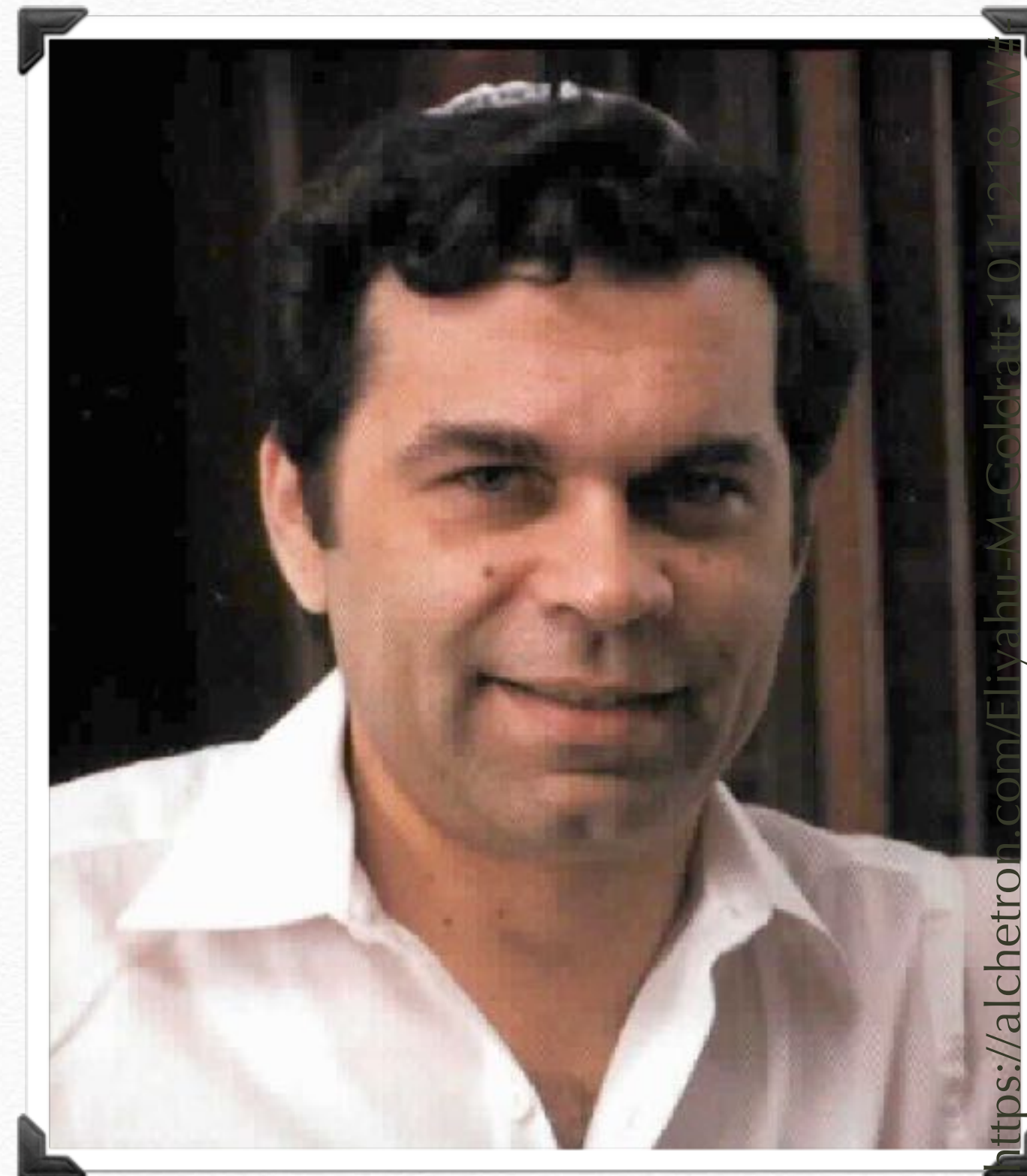
How to break the rules

Dan North
@tastapod

Eliyahu Goldratt

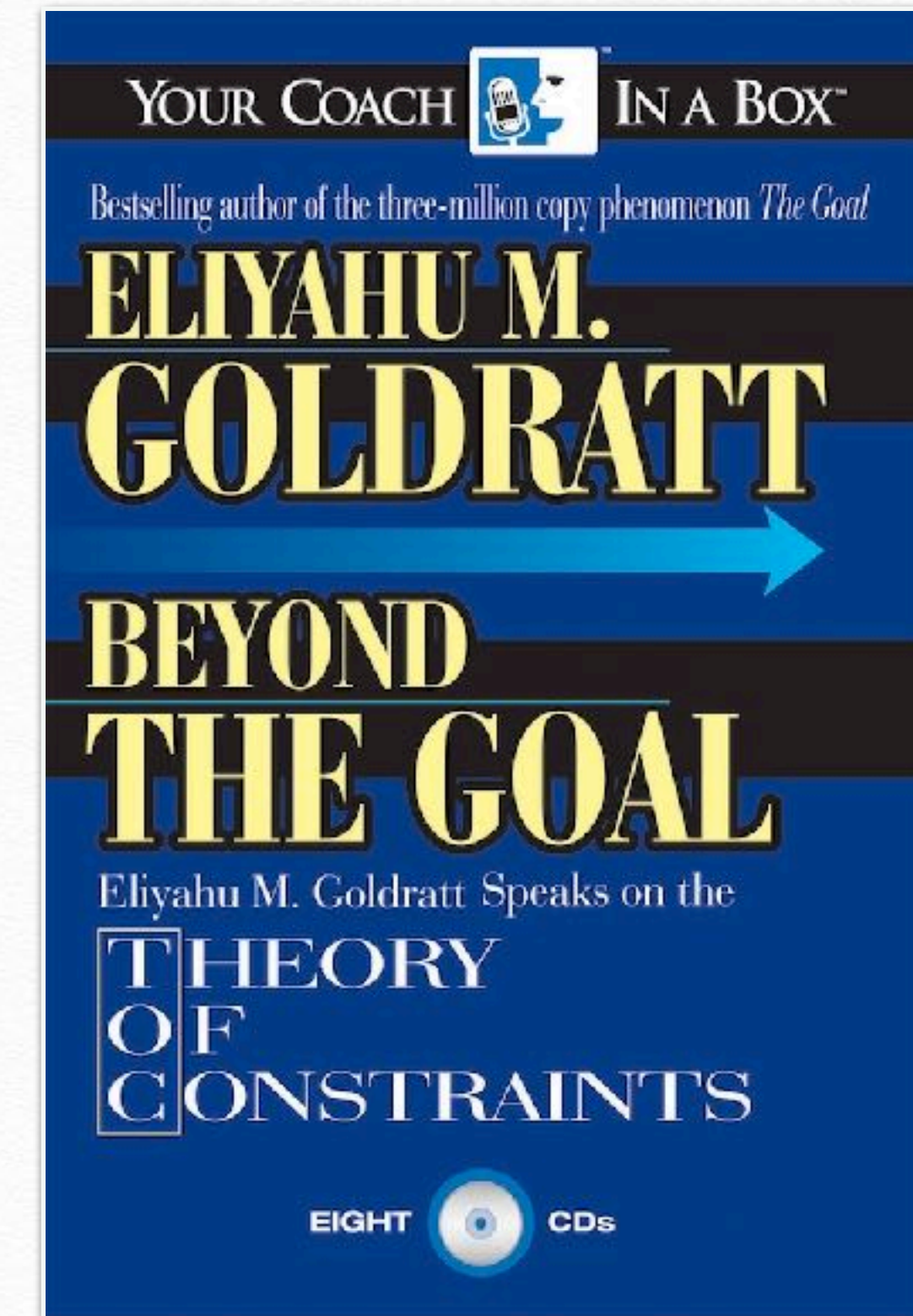


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**THEORY
OF
CONSTRAINTS**

EIGHT



CDs

“Technology can bring benefits if, and only if, it diminishes a limitation.”

—Eli Goldratt

“Technology can bring benefits if, and only if, it diminishes a limitation.”

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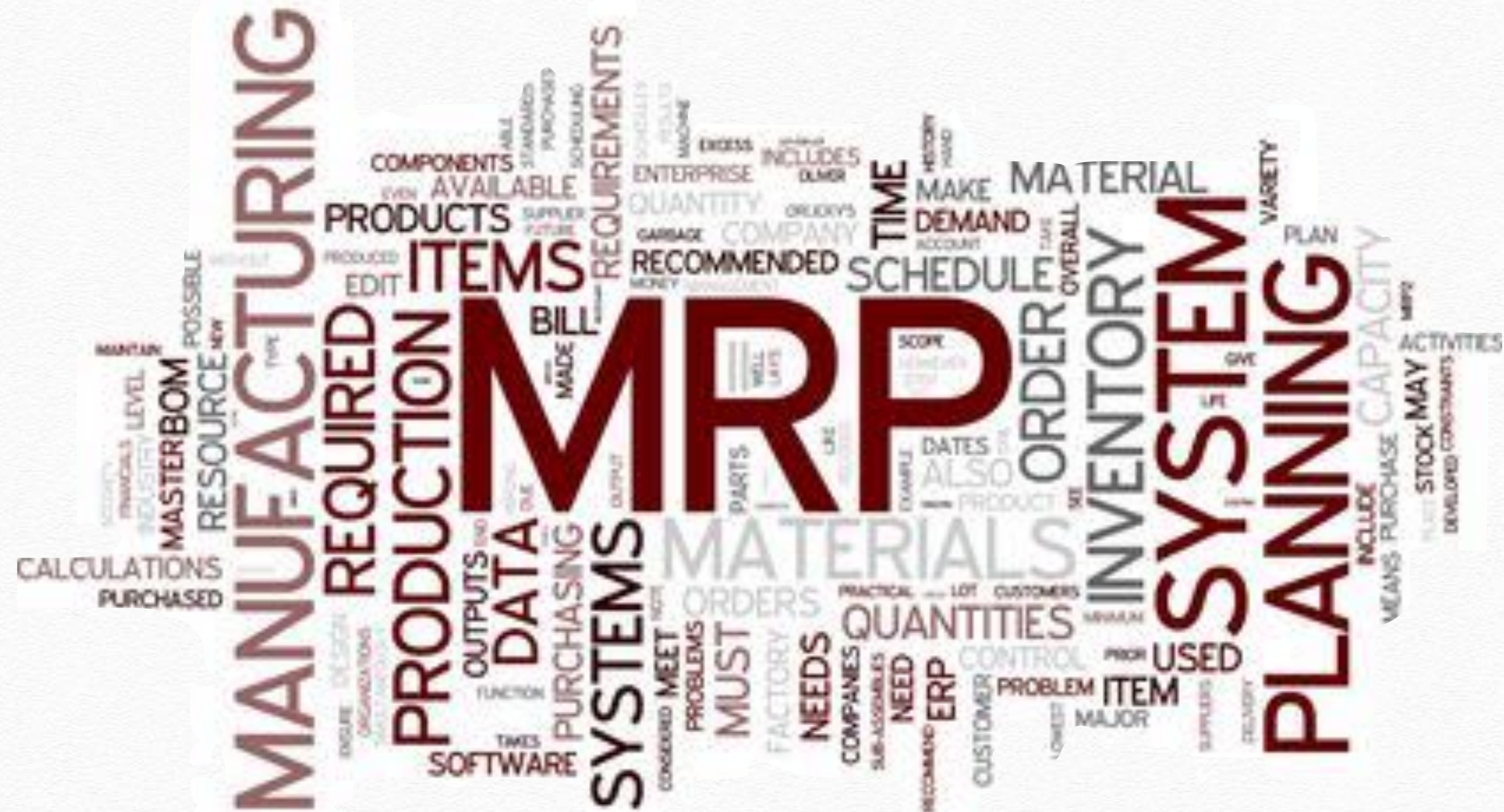
We are really really bad at
adopting new technology

We are really really bad at
exploiting new technology

How to adopt a technology

1. What is the **power** of the technology?
2. What **limitation** does the technology **diminish**?
3. What **rules** enabled us to **manage** this limitation?
4. What **new rules** will we need?

Example: MRP



<http://progress-plus.co.uk/mrp-system-and-erp-system/>

Applying the four questions to MRP

1. We can carry out complex MRP calculations **overnight!**
2. It takes an **entire week** for a skilled team to calculate MRP for a month.
This is time-consuming, expensive and error-prone.
3. We can only plan **monthly** otherwise it is too expensive.
We need to buy in **big enough batches** to last the entire month.
4. We must replan **frequently** and order for **shorter timeframes**.
We need to change the relationship with our **suppliers** and **customers**.
We can **outmanoeuvre our competitors!**

Rules for coping become **policy**

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Example: ERP



<http://www.ultraconsultants.com/mrp-vs-mrp-ii-vs-erp/>

Applying the four questions to ERP

1. We can collect, process and present information across the enterprise.
2. Diminishes ignorance of what other groups in the enterprise are doing.
3. Manage cost by maximising utilisation.
Use cost accounting of utilisation to make local decisions.
Internal functions like IT seen as cost centres.
4. Use throughput accounting to measure flow of value holistically.
Collaborate across divisions and across silos.
All functions are seen as value creation.

Rules for coping become law

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Example: Cloud



http://www.gogeometry.com/software/cloud_computing_w_c_70.jpg

Applying the four questions to Cloud

1. We can have **on-demand** computing power.
2. Diminishes the **cost and risk** of running your own data centre.
3. Hardware **procurement, maintenance, decommissioning** are expensive.
Computer hardware requires **lots of people** to look after it.
Hardware (Cap-Ex) decisions are **expensive** and require lots of **governance**.
4. You can explore technological ideas **quickly** and **inexpensively**.
You can **reduce** computing power as easily as **increasing** it.
You are **renting** compute power, not buying servers.

Rules for coping become **structure**

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Example: Continuous Delivery



Applying the four questions to CD

1. We can **eliminate**, **simplify** and **automate** releasing software.
2. Diminishes high **risk** and **transaction cost** of releasing.
Reduces **bottleneck** at specialists.
3. Fixing any mistakes will be **expensive** and **time-consuming**.
Managing the risk requires **specialists** to check things **manually**.
4. Enshrine specialist knowledge in **self-evidencing processes** and tools.
Slice work into **small, valuable increments**.
Everyone needs to **learn** how to **automate**: “We’re all programmers now!”

Rules for coping become culture

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How to break the rules

1. Understand the **power** of the new technology

What does it do? How does it work?

Will it work this way for you too?

How can we **exploit** this technology?

2. Recognise the **limitation** the technology will diminish

How could you **prove** the limitation was holding you back?

How would you know it was diminishing? What could you **measure**?

What is your **control group**? What if this is just a fluke?

How to break the rules

3. Identify the **existing rules** we use to manage the limitation

How will they get in the way? What **assumptions** do they make?

Who owns the rules? Who might be **threatened** by dismantling them?

How can we make it **safe to change**? How to create a **graceful exit**?

4. Identify and implement the **new rules**

How can we **safely exploit** this new technology?

What **contraindications** should you be looking for?

How do we **introduce** and **institutionalise** these new rules?

“Technology can bring benefits if, and only if, it diminishes a limitation.”

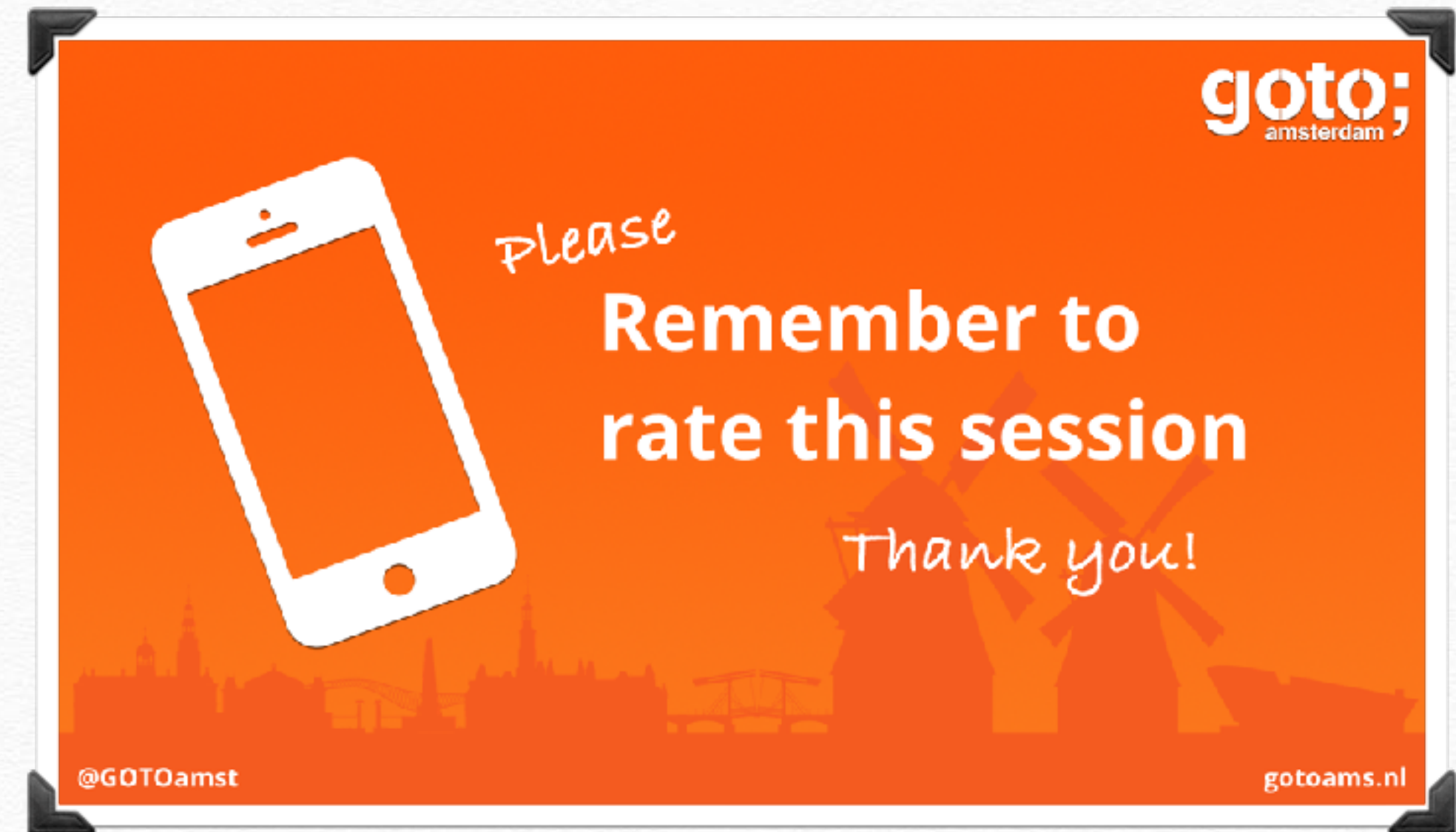
—Eli Goldratt

Now go break some rules!

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