Spreadsheets

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The Big Picture

1960
1970
1980
1990
2000

Formalization of algorithmic approach to accounting
Algorithmic accounting seeps into practice
First usable electronic spreadsheets
Development of features / add-ins
Incorporation of SE principles

1964: Mattessich
1979: VisiCalc
1983: Lotus 1-2-3

Spreadsheet as a research tool
Spreadsheet as a product
Spreadsheet as a formal concept

Distribution of Spreadsheet Papers & Tools

This figure is based on a quick review/skim of 60 papers/tools, mainly from Accounting Review, ACM + IEEE conferences focused on visual languages or computer-human interface, and industry products (e.g.: VisiCalc).

Shifting Research Approaches

Man with a plan.
Distribution of Spreadsheet Papers & Tools

Period | % of Papers & Tools from Period
--- | ---
1964-1974 (6 total) | RS, ET, EM
1975-1984 (10 total) | RS, ET, EM
1985-1994 (13 total) | RS, ET, EM
1995-2004 (28 total) | RS, ET, EM

Shifting Research Approaches

If you build it, they will come.

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Focus: Enhanced Tool

1. Spreadsheets are useful for calculations.

2. We had an idea for how to make them better.
   1. Database integration (1983)

3. So we implemented it and here’s what we found.
   1. It was feasible.
   2. It was better at X.
   3. It was profitable because of Y.
   4. We learned enduring lesson Z.

SE for end-users?