

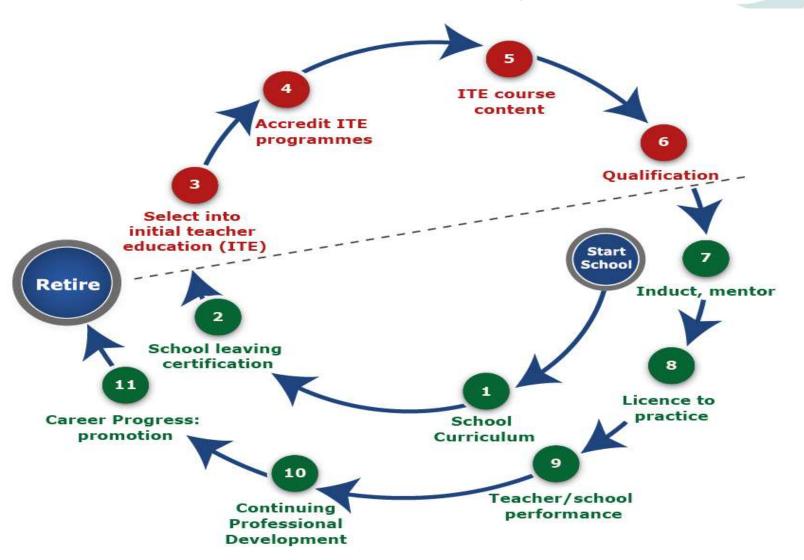
# Priorities for Teacher Development

What can corporate donors do?

Trialogue and Capitec Forum 22 August 2019



# SA in a vicious cycle



Recent research indicates that on entry around half of student teachers tested across 3 campuses in a pilot test in 2017 and 7 campuses in 2018 were unable to achieve 50% on a primary school maths test

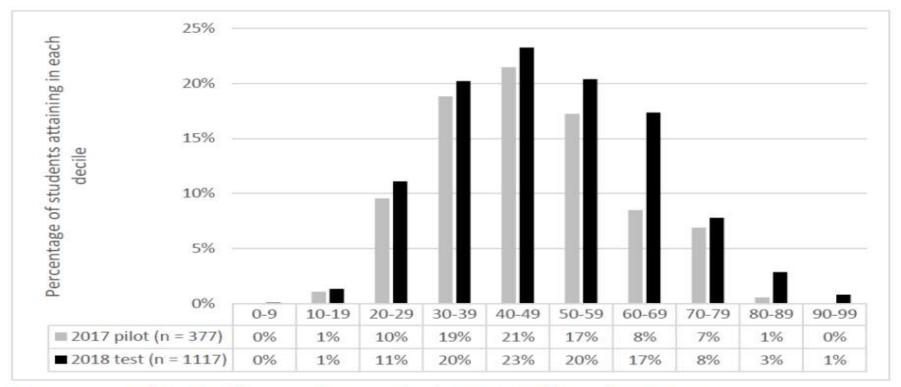


Figure 1: Distribution of attainment per decile in 2017 pilot and 2018 test

# How much maths do they learn in 4 years?

These students did particularly poorly on items involving fractions, decimals, ratio and proportion (rational numbers), topics which underlie pretty much all of high mathematics

But the really startling finding is that, after 4 years of study, final year students at three of these universities had made very little progress on learning these most fundamental concepts, with the large majority still performing around 40% and less

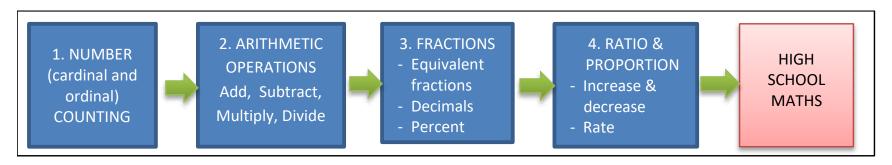
#### Two rational number items

18 out of 600 computers were broken. What percentage of the computers were broken?

3,052 x 1000 =

#### The Limits of CPD

Even where CPD programmes are effective, it is well to recognise the limits of what can achieved working with teachers who are busy people with many family and other out-of-school commitments and are often past the age of active learning Consider the task of improving the mathematical knowledge of Grade 6 teachers, currently around stage 2:



To get them from where they are to the end of stage 4, where they are able to exhibit a flexible understanding of proportional reasoning, will take more than a couple of afternoons of CPD after school.

# Consequences of teachers not mastering multiplicative reasoning



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# What can in-service training (CPD) achieve?

Over the past 3 decades the public sector and corporate and international donors have been pouring money into CPD with the aim of improving teachers knowledge and skills.

In 2014 for example the DBE budgeted over R1bn for CPD while the private sector contributed at least an equal amount.

Unfortunately, these efforts are generally not evaluated



### The Impact of CPD

Where evaluations do occur the results are generally not encouraging

For example, an evaluation of a two-year part-time Advanced Certificate for Teaching (ACT) programme concluded that:

... some teachers did shift their beliefs about teaching mathematics and literacy, but overall there was no extensive measurable learning over two years

#### **How to make CPD more effective**

More encouraging are findings from extensive pilot programmes aimed at assisting early grade teachers to teach reading in Gauteng, KZN, NW and MP.

This research and development approach to establishing the effectiveness of CPD programmes needs to be supported

Failure to assess the impact of initiatives costing millions of rand each leads to a lot of wastage and seemly little learning.

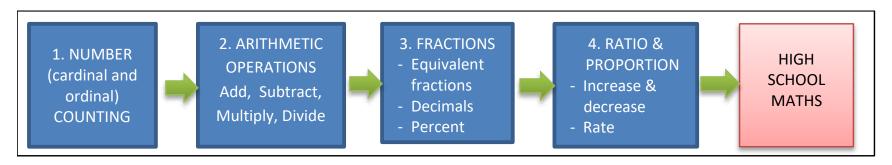
It follows that, in order to optimise lessons learned and stem the wastage of funds on ineffective programmes, no major CPD initiative should be funded without a rigorous evaluation.

#### **Research Conclusions on CPD**

- Training in the form of short workshops has little effect on teaching practice
- Should last at least for several days, must be subjectmatter specific, and must take into account the challenges faced by the school
- Initial teacher education (ITE) and CPD two serve distinct purposes and are not interchangeable:
  - ITE provides teachers with a solid base of the foundation knowledge and skills for teaching
  - CPD allows them to update their knowledge and skills, and to adapt these to changes in the teaching environment

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# Thank you!

