

**Scotland and CEM** working together

Evidence-informed teachers on the move

**Case study** International Community School, Jordan



# **INTRO**DUCTION

# GETTING THE MEASURE OF PROGRESS

In November 2014, the National Foundation for Educational Research announced its key messages for the next government in the run up to the May 2015 General Election. The NFER's core message for all political parties - and for the education system as a whole - is that evidence needs to be at the heart of the debate and they highlight the need to use data at all levels. Research has shown that good data, used effectively, can improve the performance of pupils and schools. For this reason, CEM support the call to invest in upskilling educational professionals to deal with data confidently and effectively, particularly in the area of pupil assessment.

Good use of data could not be more important as we move into 2015.

Across England, the first maintained-sector primary schools to introduce a reception baseline assessment will choose their assessments from the list of government-accredited providers announced in February. The government accountability framework also requires schools to effectively demonstrate progress throughout KS2–using the best tools to collate, organise and communicate this information is a challenge.

We are excited to announce that BASE, CEM's next-generation reception baseline assessment, has been accredited, and we look forward to working closely with schools this year to get the most out of the process.

The BASE assessment itself comprises early Literacy and early Maths, and an observational Personal, Social & Emotional Development section offers a comprehensive and rounded profile of each pupil. The follow-up assessment

offers insightful measures of progress, and the sophisticated reporting will enable teachers to investigate and explore the data in a way that is most appropriate for their pupils and their school.

You can find out more information and watch a video overview of our assessment by visiting our BASE webpages at: cem.org/BASE

Or if you would like to arrange a chat to discuss your schools' needs, please email us at:

base@cem.dur.ac.uk or call +44 (0) 191 334 4221

In the meantime, we hope you enjoy reading our Spring 2015 CEM Connect!

Katharine Bailey Director of Applied Research

# CEM SUCCESS IN RESEARCH EXCELLENCE FRAMEWORK

The highly anticipated results of the Research Excellence Framework (REF) 2014 were published in December and were extremely good news for CEM and the School of Education at Durham University. REF is the system by which the quality of research in UK universities is assessed and a major review takes place approximately every eight years. The results highlighted that overall 81% of research conducted by CEM and the School of Education was considered to be of 'internationally excellent quality' or 'world leading' and that it had a 100% 'Impact'\* rating.

"Impact" is evidence to show that research has led to a change in practice and policy beyond academia.

For more information about Durham's REF performance visit www.dur.ac.uk/research/ref/





# EVIDENCE-INFORMED TEACHERS ON THE MOVE

We've all heard the buzz around the staffroom: comments dart around coffee cups like a well-struck pinball, eyebrows rise with intrigue, and imaginations flare as they try to visualise what 'it' looks like. Yes, someone's trying 'it'. Buoyed with the enthusiasm of a recent training course, a colleague is implementing a new, research-based strategy to improve children's reading skills.

Eventually, the eyebrows stand at ease, staffroom discussions move on and the 'brilliant', 'new' reading nitiative takes hold and becomes school policy.

How good is the research on which the intervention is based? Does it work? How well does it work? Is it better than other strategies available? Only a robust evaluation can answer these questions with any degree of accuracy.

While the example above is clearly hyperbolic, it serves an illustrative purpose and generates a crucial question: What is the evidence to support the teaching and learning interventions we use in schools? Moreover, it raises two further questions: Where is such evidence found and how should it be used?

If we accept that most teachers enter the profession with a desire to improve the learning and lives of their students, it can be assumed that most teachers want to use the most effective approaches available in their teaching. But there is something of a grey area between the intention to use the best available evidence of what works in education, and the implementation of this evidence. The process of improving health through diet is a useful analogy here: we may well intend to eat better to improve our health, but unless we know which

foods are healthy (or healthier than others), where to buy them, how to prepare them and how much to consume, intentions are unlikely to be implemented.

Thankfully, help is at hand. Just as Jamie Oliver came to our culinary rescue, so the Education Endowment Foundation (EEF) is seeking to rid English schools of the educational equivalent of the turkey twizzler. Adopting an evidence-informed process to their activities, the EEF has worked with staff at CEM and the School of Education, Durham University to reduce the gap between the intention to use good research and its implementation in schools. The main vehicles for this are the Sutton Trust EEF Toolkit (Higgins et al., 2013) and the DIY Evaluation Guide (Coe, Kime, Nevill, & Coleman, 2013).

A visit to the Education Endowment Foundation's website (www. educationendowmentfoundation. org.uk/toolkit) is a fruitful one for teachers and school leaders seeking to understand more about what works in schools. The Toolkit is the ideal starting-point when trying to decipher what good evidence suggests might work in school; up-to-date research summaries and indications of the potential effects of specific

The information the Toolkit provides, however, is only a portion of the story. What you will find there is evidence of the effectiveness of particular interventions in particular contexts, and it's this latter part that is crucial to understand. Well-designed trials of interventions are conducted under specific conditions, with specific children, in specific schools, in specific countries, and offer results that apply directly to those contexts, but which may be applicable elsewhere. Using

them to inform decisions taken in another school (in a different context) must begin with the question: How similar or different are my students and my school to those in this study?

The Toolkit offers the starting point, but what next? The EEF DIY Evaluation Guide is a simple tool designed to help teachers and school leaders evaluate the impacts of interventions in their own school. As such, it provides the support to take the next logical step: if it is known that an intervention has a positive effect 'on average', understanding its effect in a specific school offers a more refined basis for decision-making about intervention implementation.

conversations about the effectiveness of interventions which begin by asking 'Does it have a positive impact on average?' (the Toolkit is a good first step), but then are followed by 'Does it work here?' (using the DIY Evaluation Guide will help here). Such conversations will, I believe, become increasingly common in schools: evidence-informed teachers are on the move, and they are demanding more and better-quality evidence to support their professional practice. As their needs and their numbers increase, so CEM and the EEF will work together to meet and support them.

# Further Reading

Coe, R., Kime, S., Nevill, C., & Coleman, R. (2013). The DIY Evaluation Guide: Education Endowment Foundation.

Higgins, S., Katsipataki, M., Kokotsaki, D., Coleman, R., Major, L.E., & Coe, R. (2013). The Sutton Trust-Education Endowment Foundation Teaching and Learning Toolkit. In E. E. Foundation (Ed.). London.

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# SCOTLAND SCOTLAND WORKING TOGETHER





**DEVELOPMENTS IN REPORTING FEEDBACK:** After a decade-long relationship between Dumfries and Galloway Education and Community Services and CEM, the most recent collaboration has resulted in the design and delivery of a data analysis tool which provides easy interpretation of attainment information at pupil, class, school and authority level.

This data analysis tool will help Primary and Secondary teachers to tailor their individual pupil planning, implement practical solutions and provide timely interventions. This has been modelled, in part, from the thinking around the Senior Phase Benchmarking Tool, but now with a focus on the early phases of schooling as part of their long-term school-improvement agenda.

Critical features include the use of SIMD (the Scottish Index of Multiple Deprivation) to:

- identify pockets of deprivation
- monitor performance relative to age and expectation

• track the attainment of more vulnerable pupils

This exciting technical development will help authorities to make confident resourcing decisions and evaluate targeted intervention as well as help to develop a culture of sharing and support.

Dumfries and Galloway had been looking for a way of reporting standardised assessment data, for InCAS, PIPS and SOSCA, with a view to sharing best practice and raising attainment across the whole authority. Having explored, and rejected, the possibility of adopting an in-house solution, in late 2013 members of

the Dumfries and Galloway Council for Educational Services paid CEM a visit in search of a collaborative solution and were shown new and versatile reporting possibilities, being developed by CEM using Tableau software, a suite of interactive data visualization products. The versatility of the software means that feedback reporting can be adapted and tailored to meet the needs of education authorities and practitioners working in schools.

Following the initial meeting, in early 2014 the process of research, consultation and consideration between CEM and Dumfries and Galloway resulted in the creation of



preliminary Tableau reports. CEM were able to draw matched data sets from the Dumfries and Galloway education management information system (SEEMIS) and explore a wide range of data visualisations, for example interactive charts and tables.

A crucial incentive behind developing the authority-wide reporting tool was quite simple: to raise attainment in schools across Dumfries and Galloway. However, in doing so, there was a specific interest in the ability to filter data and focus attention on designated subsections of pupils, for example: looked-after pupils; pupils on free school meals; pupils from economically deprived areas; pupils with a declared disability and so on.

Working together, CEM and Dumfries and Galloway have developed an assessment reporting tool that not only presents a whole series of reports,



but a system that allows Education Authority staff, and practitioners, to identify trends in their cohorts, identify pupils who are under-performing, monitor performance relative to age and expectation and track the attainment of more vulnerable pupils.

A further meeting with Dumfries and Galloway, as well as a hands-on session with a focus group made up of interested Primary and Secondary teachers from Dumfries and Galloway has since taken place, and CEM has obtained a great amount of immensely valuable user-feedback.

This feedback is now helping us to shape the future of our reporting system for Scotland.

Happily, the collaboration between CEM and Dumfries and Galloway has created the prototype of a system which could be expanded, in the

future, across all other Education Authorities in Scotland and as we consider options for expanding this service, it is clear that the priorities for one authority will not necessarily be the same as those for another and, indeed, that these priorities may change over time. So, the next steps on this journey will be twofold for CEM:

- to continue to listen to the needs of the Education Authorities and work together to determine the common core of data required for analysis.
- to find ways to import that data regularly, reliably and consistently from the Education Authorities' education management information systems in order to update the reports for the authority and the individual schools.

CEMCONNECT 06

# IT'S ALL ABOUT ABIT THE BASE!

CEM'S RECEPTION BASELINE ASSESSMENT RECEIVES GOVERNMENT ACCREDITATION

We're delighted to announce that our new reception baseline assessment, BASE, has received accreditation from the Department for Education.

# What's Happening?

From September 2016 the Early Years Foundation Stage Profile will no longer be compulsory and, as part of the government accountability framework, schools in England will be required to demonstrate expected levels of progress from a baseline in reception or by meeting attainment standards at the end of KS2.

The DfE have announced a list of approved providers (which can be found at the DfE website www.gov.uk) and schools are being encouraged to implement a reception baseline from September 2015. To do this, schools need to register with their preferred provider by end of April 2015. The DfE will reimburse the basic cost of approved reception baselines for local-

authority maintained schools, academies and free schools.

# What is BASE?

For the many schools who know our PIPS Baseline assessment, BASE will feel familiar but new.

CEM's work is not-for-profit and our enduring reputation for reliability began when we first developed our baseline assessment for reception children, PIPS Baseline, in 1994. Since then PIPS has remained in constant use for twenty years, with over 3.6 million assessments processed across several governments, countless policies and hundreds of initiatives. We are now applying the same robust, research-based, reliable methodology to this next-generation baseline assessment and the result is BASE – starring Milly the Bug!

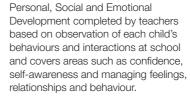
BASE is carried out at the start of reception to form a baseline – a measure of what your children know and can do

right at the start of their school life. A follow-up assessment can be carried out at the end of the year to determine the measure of progress made. The PSED assessment can be carried out at multiple times throughout the reception year as required.

The BASE assessment takes just 20 minutes, and is carried out one-to-one at a computer or laptop by the teacher or teaching assistant. Milly the Bug guides each child through a series of fun and engaging activities, covering the following areas:

Literacy to establish early literacy skills (letter recognition, word recognition and comprehension), vocabulary and phonological awareness.

Maths to address mathematical concepts (bigger/smaller, taller/shorter), along with number identification, shape recognition and simple arithmetic.



# Why Choose BASE?

Employing 30 years of assessment experience, BASE has been designed by academics and educators from Durham University to be a standardised, fair and reliable assessment.

BASE is quick and easy for teachers to use and offers you valuable one-to-one time with each pupil right at the beginning of their school life, enabling you to see very quickly what each pupil knows or does not know. It takes just 20 minutes with each child and there is no marking required.

The assessment is fun, engaging and computer-adaptive. It is made up of a

series of enjoyable activities helping you to objectively gauge each child's level of development in literacy and maths, as well as offering a more comprehensive and rounded profile of each child's personal, social and emotional development by combining objective and observation based assessment.

The assessment feedback presents key information to inform planning and enable you to monitor progress. Detailed and interactive feedback reports include data at an individual, class and whole school level.

# Choose the right package for vou

BASE is available in the three packages:

 BASE Inspection Ready - An assessment at the start and end of Reception and a PSED assessment at multiple times throughout the year as required, plus our most comprehensive reporting

- package featuring parental reports, comparisons with 'A School Like Ours' and interactive functionality.
- BASE Progress An assessment at the start and end of Reception and a PSED assessment at multiple times throughout the year as required, plus a wide range of reports indicating progress measures at a pupil, class and school level.
- BASEline A start of Reception assessment of Literacy and Maths providing the DfE scaled score.

# Find out more at cem.org/BASE:

- Try out the assessment and view example feedback reports
- Register to attend a webinar online or an event near you
- View a wealth of resources on our dedicated BASE pages



CEMCONNECT 08

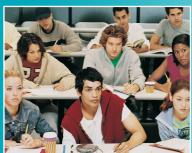
# ASSESSMENT BEYOND LEVELS

RISING TO THE CHALLENGE

Since National
Curriculum levels
were removed from
the state-maintained
school curriculum
in September 2014,
teachers have been
finding their way
in this 'brave new
world'.









Many teachers agree that the removal of levels marks an opportunity for improvement. No longer is the focus solely on attainment, on striving to ensure pupils scrape above the necessary threshold. Instead we can now focus on progress, and importantly, what this means for each individual child – for some children, a level 3 is an exceptional achievement and shows significant progress, even though they may be a level below their classmates.

However, in spite of their obvious flaws, levels did at least provide a common language. Teachers everywhere could have meaningful conversations in any forum and could understand the performance of their pupils within the wider context of a national cohort. Publishers could easily develop and classify teaching and learning resources. Parents could choose appropriate resources to support their child's learning and could comprehend whether their child's performance was in line with expectation.

So, gone are the flaws, but also the benefits of a standardised national system.

### The post-levels landscape

Since the removal of levels, many schools are continuing just as before - retaining National Curriculum levels as familiar indicators for teachers and parents. However, some schools are developing new approaches to assessment. The Assessment Innovation Fund, created by the DfE, awarded 8 schools up to £10,000 to develop free and easy-to-use assessment packages, which could be shared with other schools - these include 'progression planners', 'ladder' approaches and a 'skills passport' which incorporates an in-class app. You can find full details of the winning schools at the DfE website.

A report commissioned by the National College for Teaching & Leadership, released in September, summarised the research carried out at 34 teaching school alliances across the country and made several key recommendations for educators seeking to improve assessment. The report called for a cultural shift regarding the nature, range and purposes of assessment; it also encouraged the organisation of conferences and seminars to develop assessment expertise; and finally called for the development of professional knowledge of emerging, effective practices.

The most striking difference in the postlevels landscape is the emphasis on dialogue that simply did not exist in the previously prescribed framework. We are being encouraged to think, discuss and share ideas – and this marks an excellent opportunity to reimagine our approach to assessment.

# **Reassessing Assessment**

Understandably, there is a real sense of anxiety in some schools when faced with this challenge of creating a system that effectively and efficiently monitors pupil attainment and progress. Many schools and educators are concerned about heavily investing in a brand new assessment approach, worrying that they may later discover that it is not fit for purpose.

However, teachers should draw confidence from the fact that they know how to assess and they know what children should know! What is required is the self-assurance to apply this knowledge.

# How CEM can help

- Read CEM's case studies 'A School Like Ours' and find out how other schools are responding to Assessment Beyond Levels: www. cem.org/levels
- If you would like further information about how CEM's suite of assessment and monitoring systems can be used in your school as a framework for evidencing success, please contact us for a conversation to help you select the systems that meet your
- Email levels@cem.dur.ac.uk
   Tel +44 (0)191 334 4255

## **Further Reading**

Beyond Levels: alternative assessment approaches developed by teaching schools

Research Report, September 2014 Julie Lilly, Alison Peacock – The Wroxham transformative learning alliance

Sue Shoveller, Dr d'Reen Struthers – South Farnham teaching school alliance

Schools win funds to develop and share new ways of assessing pupils Press Release, May 2014 Department for Education

# It may be useful to consider the following key elements:

- You need to identify what is 'important' knowledge for the pupils to have at the end of the programme of study. Tim Oates stresses the need to be selective – 'don't assess everything that moves, just the key concepts'.
- You need to apply effective techniques for checking that pupils have this knowledge – this could be a combination of observation and objective assessments.
- A baseline provides a necessary starting point from which to measure progress and a means to form a hypothesis on where students are in their learning when they begin a programme.
- An external assessment along the way will provide a 'sense check' and enable comparison of your class with a broader sample.
- You will need a system or process to enable you to record and communicate results as required.
- A continued commitment to engagement and discussion about assessment, both internally and externally, is very important in order to continue sharing and building knowledge and understanding. Be confident in thinking about your work in the classroom, share ideas with others and encourage them to try them out.

This is a real opportunity to see some exciting changes in the way we do assessment – to be brave and experimental, to better understand the progress of our students and to optimise their learning opportunities.

# LAUNCHING THE USE OF CEM DATA

# IN THE INTERNATIONAL COMMUNITY SCHOOL, JORDAN



In the last edition of CEM connect ICS Jordan wrote about the beginning of their journey in using CEM data as a vehicle for school improvement. ICS had just received their first set of INSIGHT data, and now, in the autumn term of 2014, data analysis is certainly full steam ahead...

# Launching ALIS

The beginning of a new school year is always very busy getting to know students and recognise their strengths and needs quickly, and this year as part of Year 12 Induction Day at ICS Jordan, all Year 12 students sat CEM's ALIS assessment (measuring Vocabulary, Maths and Non-Verbal ability) so that we would have data in addition to their GCSE results to help us with target-setting. For some new students who had recently joined us, and had not taken GCSEs, this would provide the only independent set of data available to help us understand their prior attainment levels and set specific and realistic targets.

Although initially not part of our plans, we also decided to use the ALIS assessments with students in year 13 in order to have some extra data on which to base predictions for A level, in addition to their GCSE results, AS results and their progress reports throughout the year. The 'visual' of the independently produced chances graphs is exceptionally useful in those important learning conversations which connect ability, motivation, attendance and sheer hard work to eventual outcomes.

The data is openly shared with KS5 students in progress reviews and in general, these conversations help raise

expectations of students and staff. On the other side of the coin, I am certain that many teachers will have found themselves in situations where students, and sometimes their parents too, try to engage staff in negotiations about the predicted grades which will appear on their university applications. The Chances Graphs can help provide a reality check for some of those with unrealistic expectations, whilst also keeping the door open to exceptionally high performance in areas that previously may not have been recognised or acknowledged.

The target is the 'what is possible'; the aim of the learning conversation is the 'how to get there'.

### What MidYIS and INSIGHT showed us

Similarly, in order to gain a baseline measure of ability at the start of Key Stage 3, all of our year 7 students took the MidYIS assessment, in September. The MidYIS assessment enables us to get a measure of pupil ability in four key areas – Vocabulary, Maths, Non-verbal and Skills, and the feedback we get from the assessments is both an indicator of later academic achievement and a diagnostic tool for directing teaching and learning.

# So we now have a wealth of CEM data. But how can we ensure that teachers use it?

We downloaded all the data onto our VLE and then made the CEM data the focus of a whole staff meeting (Three types of CEM assessments, four year groups, fifty staff and just one hour!) The first part of the meeting was spent ensuring that each person could find where the data was located – making data easy to find and available for teachers is crucial if the feedback is to be fully exploited. We also covered how to navigate through the various sections of the feedback, and how each of these sections could be applied.

The MidYIS feedback includes an exceptionally useful Individual Pupil Record sheet, Predictions and Chances Graphs as well as the Historical Band Profile Chart, giving an overview of cohort intake ability over the years. The MidYIS feedback showed very powerfully our need to focus on literacy across the Curriculum as a major whole school initiative since vocabulary scores are significantly lower than all other areas.

Similarly attainment in the reading modules of the INSIGHT assessment was relatively low and has sparked a drive across all departments in explicitly teaching reading skills. An additional KS3 reading programme is being developed in tutor periods in conjunction with a special section of the library designed to entice KS3 readers to pick up a book.

The second part of our data meeting picked out some individual student profiles to identify the questions which might be posed when looking at the pattern of the data. This is the real beauty of CEM assessments - CEM data does not provide all of the answers but it helps teachers ask better questions.

# Faculty Heads identifying ability

At the end of October, four sessions were planned into our professional development days which focused on data. The first was for Heads of Faculty focusing on the data available in the spreadsheets which show the range of abilities of students in each cohort. The ability to sort the data in different ways is a particularly attractive feature of the MidYlS data. Exceptionally able students were noted and discussions scheduled for the next Faculty Heads meetings on how their particular gifts can be developed. For those subjects where students are set by ability, this extra data is used to determine the groups.

# Giving form tutors confidence

The following three sessions were for the tutors of years 7, 10 and KS5. Each form tutor was given a hard copy of each student's individual data including Chances Graphs. Those students, especially those in year 7, whose feedback demonstrated big differences between the different component scores, which could not be easily explained, or those who had a standardised score of less than 85 in any area, were referred for further assessment. Meetings between form tutors, students and their parents were already scheduled for the following week and tutors left these sessions feeling much more confident about these forthcoming conversations. As the year progresses I shall be working with Heads of Faculty in using the data as part of quality assurance and faculty review. Our CEM journey continues...

Sue Holt is Head of Secondary School at ICS, Jordan and has extensive experience in international education.

# DATES FOR YOUR DIARY **EVENTS** CONFERENCES **EXHIBITIONS**

Discover how CEM can help you improve standards at your school. Learn how to get the most from CEM systems and learn from colleagues. Come along to one of our regular events or come and meet us at an exhibition or conference. If you are in the UK you are welcome to come and visit CEM at Durham University.

For a full list visit www.cem.org/events

# MAR 17th London:

3rd annual Effective Assessment to support 2015 Progress in Reception conference

# 19th - 21st Birmingham:

Education Show 2015

### 23rd London:

Primary Assessment Conference

### 24th Sunderland

Schools North East Patrons Dinner

MAY 2015

## 1st - 3rd London:

NAHT Annual Conference

## 9th - 11th London

# TAKE PART IN **CEM RESEARCH**

# **Developing an early years sleep** intervention to improve educational outcomes

We are looking for nursery schools in North-East England to help us develop a sleep intervention for children aged 3+.

The CEM research team would like to speak to nursery staff over the phone, for 10-15 minutes, to learn more about children's experience of sleep while in nursery and how a sleep intervention may be implemented within this environment. Anyone who chooses to take part will receive a £5 High Street gift voucher.

If you are interested in taking part or would like further information on the project, please contact Dr Lyn Robinson at Lyn.Robinson@cem.dur.ac.uk or **0191 334 4197**.



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