

The Starpath Project

Annual Report 2014



Starpath

A University of Auckland Partnership for Excellence



**THE UNIVERSITY
OF AUCKLAND**

NEW ZEALAND

Te Whare Wānanga o Tāmaki Makaurau



Starpark

A University of Auckland Partnership for Excellence

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Starpath Annual Report 2014

The Starpath Project for Tertiary Participation and Success was established by The University of Auckland in 2005 to bring about ‘a dramatic transformation in educational and economic outcomes’ for groups of students who were under-represented in higher education in New Zealand. The Starpath Charter stated that the project aimed ‘to change lives through education.’ It was about new opportunities ‘for individuals, for school and tertiary institutions, for the economy and for the nation.’

Starpath works with partners in the secondary school system and the tertiary sector to identify and address the barriers that prevent participation and success in degree-level education, especially for Māori, Pacific, and other students from low socio-economic communities. The Project aims to increase NCEA achievement for these groups of students, and open educational pathways that will lead to fulfilling careers and successful lives.

Since 2005 Starpath has developed an evidence-based programme that focuses on:

- establishing quality longitudinal data and student information systems that can be used to set achievement targets for individual students and groups of students;
- providing academic counselling which helps students understand the path they need to follow to fulfil their educational goals and enables them to chart their progress;
- bringing together students, parents, Whānau and teachers as partners in the discussion about educational goals and progress.

Starpath aims to raise school and student aspirations, to support activities that impact positively on teaching and learning, and to enhance organisational and leadership effectiveness.

We know Starpath activities make a difference. Clarity about goals, an understanding of what it takes to achieve these, and constructive partnerships in teaching and learning bring school improvement and transform student experience and outcomes.

Reports



From the Chair

This introduction is being written in the run up to the 2014 general election. This campaign once again sees education as an election issue.

It is not that the nation and its political parties are divided on the goals of education. All see a sound, stimulating and rich educational experience as vital in enhancing life chances and achieving individual potential. How we provide such an education for all children is the issue.

The Starpath Project began with a focus on students in Years 11, 12 and 13, with the view that these were the years which determined whether or not a student might advance his or her education into degree study. It is clear, however, that achievement in these years is highly conditional on learning in the prior years. Some students come into Year 9 well below the expected curriculum level and find it very difficult to make the sort of progress needed to set them up for senior school study. Likewise young children may come into primary school without a secure and confident basis for learning and never catch up with their peers.

Increasingly we realise what a huge task it is to provide the education that each and every one of our future citizens needs. This is the task that politicians have to tackle. Wouldn't it be good if we could have cross party agreement that children and their education come first and agreement on the kind of education system that would realise our goals?

Professor Raewyn Dalziel
Chair, Starpath Board



From the Director

The Starpath Project has been in operation for nine years. One of the ultimate aims of Starpath when it started was to develop evidence-based ways of raising the achievement of Māori, Pacific, and other students in schools serving our low socio-economic communities, and to share the findings more broadly throughout the country. Much of our time over the last year has been spent on securing two Ministry of Education contracts, *Kia Eke Panuku: Building on Success* and *Starpath Extension: Years 9 & 10*, which will take the findings of the Starpath Project and share them much further afield.

After seven and a half years as the Director of the Starpath Project this will be my last report as I leave The University of Auckland to take up a new position at the University of Melbourne. I wish to take the opportunity to acknowledge the work of all the people who have been involved with my time at Starpath. In particular I want to express my gratitude to all the schools, staff, students and parents who continually remind me of the realities and challenges of educating our young people in today's world. I sincerely thank you all for making this project possible. The success of the project is your success. I also wish to acknowledge the work and support of the Starpath team and board, and the Tertiary Education Commission and the ASB Community Trust for their continued financial support. I wish the project well for the future.

Professor Elizabeth McKinley
Director, Starpath Project

Group A schools evaluation

An evaluation of Group A schools is building a picture of how effective the Starpath programme has been and how schools have experienced the Project. Group A consists of the first 16 schools to have joined Stage 2 of the Starpath Project.

Group A schools joined the Project in 2011 and the remaining 18 schools (Group B) joined in 2012. The pace of the implementation was adapted to suit each school and its capacity to introduce the programme, but the expectation was that by the third year of the partnership all schools would have integrated the key elements of the 'DUACTS' programme into their school activities.

The implementation of the Data Utilisation, Academic Counselling and Target Setting (DUACTS) programme across the 34 new partner schools is a major aspect of Stage 2 of the Starpath Project. Over the three years school staff received intensive professional learning development (PLD) through regional workshops and seminars and on-site visits for training and mentoring. The Starpath team has also regularly visited schools to observe activities such as academic counselling and parent-student-teacher (PST) conferencing, providing written feedback following each visit. Monitoring visits to Group A schools at the end of 2012 provided the opportunity to assess each school's progress and to provide formative feedback in relation to programme implementation and its impact.

In the second half of 2013 the Starpath team completed a series of evaluation visits to Group A schools to review progress and the overall effectiveness of the DUACTS programme (Group B schools will be evaluated in the second half of 2014). As well as interviewing the school principal and between one and three senior and middle leaders in each school, we conducted focus groups with teachers and with senior (Years 11, 12, and 13) students. In total, we interviewed 14 principals and 32 other school leaders, and conducted focus groups with 147 teachers and 249 students. Teacher groups included subject teachers, and form/Whānau teachers usually responsible for academic counselling and/or PST conference facilitation. Purposive sampling ensured adequate representation of Māori (21%) and Pasifika (35%) students. Although 32% of the students were not (yet) sure of their career plans, 79% aimed to achieve University Entrance (UE) and 74% aimed to attend university.

The evaluation focused on different stakeholders' experiences of, and views about, the impact of the DUACTS programme on student achievement, on student engagement and attitudes to learning, teacher-student relationships, family/Whānau-school engagement, and teachers' work and morale. Additional questions were asked about the challenges and difficulties related to the programme's implementation, adequacy of support provided by Starpath, and the overall sustainability of the programme into the future.

In early 2014 each school was provided with an individual report, summarising student achievement rates over the past three years and the views of the school's leaders, teachers and students on the impact of the DUACTS programme. Although the full evaluation report will not be available until after the completion of the evaluation of Group B schools, it was important that each school receive feedback as soon as possible. For some schools the report has provided supporting evidence and endorsement for the practices and processes now in place. For a few schools, student voice has been a welcome addition to data not usually collected by the school and in some cases practices have changed as a result. Other schools have responded to the feedback by refocusing on areas that require additional work or support.



Although the full analysis of the data is yet to be completed some important themes are evident:

- There have been measurable shifts in family/Whānau-school engagement, both in terms of parental attendance – from 20% or less at traditional parent-teacher meetings to an average of 75% – at the redesigned PST conferences and ongoing contact initiated by both parents and teachers. Most schools have sustained high attendance figures over three years.
- Staff and students have reported improved student-teacher relationships, with greater focus on student learning and achievement, and reduced absenteeism and stand-down rates.
- Some schools have shown significant improvements in their NCEA achievement rates. However, there is still much work to be done in ensuring that improvements are consistent, occur at all levels and across all groups of students.
- Most schools face a challenge to achieve consistent quality of academic counselling by individual teachers, and to ensure effective use of student achievement data in classroom teaching practices.
- Clear leadership and effective communication are critical to successful implementation and embedding of the new practices, as well as to perceptions about the sustainability of the programme into the future.

Part of the success of the Stage 2 work has been in connecting schools and sharing of effective practices, so that individual schools have been able to benefit from the experience and expertise of others and the forging of supportive collegial relationships.

UniBound?

Tracking Starpath partner school students to tertiary study.

In 2010 Starpath published a book on student stories of transition from school to university. Drawn from a research project carried out by Starpath in 2007-9, the young people's stories give a sense of the experience of travelling the path from school to university.

One of the main objectives of the Starpath Project when it began was to increase the number of students from Starpath partner schools entering, and succeeding at, university study. We are now in a position to begin tracking many more students from the Starpath partner schools into tertiary study.

In 2012, a total of 4083 students from the 16 schools that joined Starpath in 2011 were recorded in the tertiary study data for the first time. Just over 14% of the students were enrolled for a degree programme, while a further 36% were enrolled in some other form of tertiary study. 50% of the students were not recorded as studying at tertiary level.

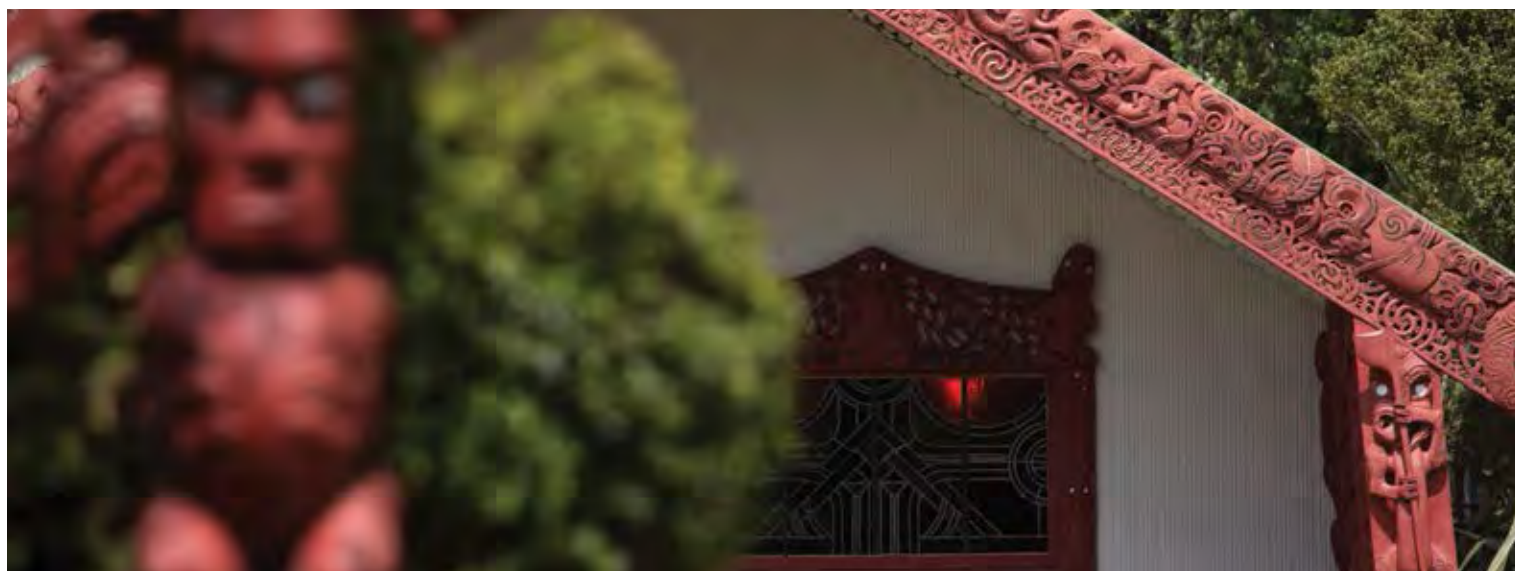
The 2012 participation rate in degree-level study was slightly above the average rates for all years 2002 to 2012. Numerically, students enrolled in degree-level study for the first time from these schools increased from 562 to 671 from 2011 to 2012, an increase of 19.3%.

In 2012, Asian students had the highest rate of first-year participation in degree study, followed by European, then Māori and Pasifika students.

There was a marked difference in the participation rates of female and male students in degree-level study in 2012. Female students enrolled in degree-level study at almost twice the rate of males, although male students enrolled in Honours programmes (most were in the field of engineering) at twice the rate of female students.

Another interest for Starpath is the proportion of students who progress from the first to a second year of tertiary study. At the moment we are only able to track the students from the original partner schools (five schools) as the other schools have not been in the Project for enough time. Highlights are:

- In 2012, retention in bachelor-level study ranged across the schools from 62% to 91%.
- The average retention rate in 2012 between Year 1 and Year 2 degree study over the five schools was 79%. The average retention rate nationally was around 87% in the most recent analysis (2003-7).



Working with the Ministry of Education

Starpath's involvement in two new major Ministry funded projects is helping to extend the Project's reach.

In the past 12 months the Starpath Project has been involved with two Ministry of Education funded projects: the *Starpath Extension: Years 9 and 10* and *Kia Eke Panuku: Building on Success*. These programmes help meet our original aspiration of a national roll-out of the Starpath toolkit.

Starpath Extension Years 9 and 10

During 2013 Starpath negotiated with the Ministry of Education to extend its work to Years 9 and 10 in partner schools. This extension contract was offered to all Starpath schools and 34 have taken it up. The contract covers all aspects of Starpath work but here we focus on the literacy strand in Years 9 and 10.

In the past three years, Starpath schools have participated in professional learning and development focused on literacy in the senior NCEA years. The *Starpath Project: Years 9 & 10 Extension* has enabled the Starpath literacy team to extend this focus in 2014 to Years 9 and 10.

Recent analyses of achievement data from Starpath schools conducted by Earl Irving show that there is a pressing need to accelerate Year 9 and 10 students' literacy achievement. To be considered at 'expected level' students should be reading at or above Curriculum Level 4 on entry to secondary school in Year 9.

To accelerate students' literacy learning sufficient for students to be ready for success in NCEA, schools need to have:

- Effective processes for identifying students at risk
- High quality literacy instruction in every lesson and in every subject area, with more effective opportunities:
 - for students to engage with rich reading materials
 - to develop students' knowledge of vocabulary and 'how texts work'
 - to build students' strategies for reading, writing and vocabulary
 - for rich student-centred 'talk about texts'
 - to increase students' motivation to read challenging subject-area texts

- Professional learning communities (within and between subjects) which act as sites of collaborative literacy inquiry and problem-solving
- Systems and capability for using a wide range of data and evidence (including formal and informal tools and student voice) to develop a detailed profile of students' strengths and needs and conduct systematic inquiry to teaching and other school practices that contribute to problematic patterns.

Aaron Wilson and Tania Linley-Richardson are supporting schools in the project to accelerate students' literacy development through a series of PLD workshops aimed at literacy leaders, teachers and department heads. To enable as many staff to attend as possible each workshop has been offered four times: twice in Auckland, once in Whangarei and once in Pahiā. In total, 71 leaders from 29 schools have attended workshops so far. In Term 3 subject-specialised literacy workshops will be offered to teachers and leaders of English, mathematics, science and social science.

Kia Eke Panuku: Building on Success

Over the last 12 months the Starpath Project has been contributing to a new research and development programme called *Kia Eke Panuku: Building on Success*. The aim is to build sector capability and capacity to achieve a transformative and sustainable system-shift in secondary education for Māori students in English medium state secondary and area schools. The purpose is to accelerate Māori student achievement in literacy and numeracy, generate equity and see Māori enjoying and achieving educational success as Māori.

The *Building on Success* work is closely related to Starpath's work and the work of other MoE projects. *Kia Eke Panuku: Building on Success* draws on the successful work of Starpath, Te Kotahitanga, He Kākano, and the Secondary Literacy and Numeracy Projects. The programme is being delivered nationally through a partnership between the University of Waikato, The University of Auckland and Te Whare Wānanga o Āwanuiārangi. Each of the institutions has a team of facilitators, led by an academic director, and is responsible for a group of schools. A significant number of Starpath schools are also on the *Kia Eke Panuku: Building on Success* programme.



Schools update: Revisiting the original partner schools

The initial five schools to join the Starpath Project helped to shape the initiative into what it is today. Here they reflect on how Starpath is embedded into school practices and how they have ensured its sustainability.



Photo supplied, Kaitaia College

Kaitaia College

Starpath would rate as the external initiative that has made the most impact on senior school achievement in the past ten years at Kaitaia College.

The early decision to include all staff in the three-way Academic Counselling process has meant a widespread and embedded understanding of the Target Setting and Academic Counselling process across all teaching staff.

The four-fold increase in attendance of parents at these counselling sessions as compared to previous report nights convinced staff of their value, particularly the discussion with Year 10 to 12 students and their families on subject selection for the following year. These meetings are an embedded practice within the school.

Within the senior school, ongoing tracking and monitoring of all senior students with regard to progress in NCEA has enabled Deans to include Academic Counselling as part of all interaction with senior students.

Progress is being made on wider Academic Counselling by Whānau Group teachers and classroom teachers. Progress is now happening in producing better and more accessible data in the junior school.

Overall the rise at NCEA Levels 1 and 2 has been quite significant since Starpath was introduced. There is still work to be done at Level 3 and beyond.

William Tailby, Principal, Kaitaia College



Photo supplied, Manurewa High School.

Manurewa High School

As an original partner school, being involved with Starpath has done a great deal for Manurewa High School. It has assisted with data use in terms of quality, capacity and creating a culture for optimal conditions of use. This has meant the school has data driven actions through policy, practice, curriculum, instruction and tracking. A focus on results has led to increased student achievement. The Starpath initiative has been sustained through systemic and student-centred change.

Timing was crucial to our implementation of Starpath initiatives. With a new Principal on board in 2010 the time was right for change. We worked in a partnership with staff to implement changes, which was a key factor in ensuring that initiatives were embedded and enduring.

In the model implemented at Manurewa the Whānau Tutor has become a significant adult in the lives of their students by engaging in academic conversations, tracking and monitoring progress, conducting student achievement conferences and having increased and improved communication with family.

Moving forward the school would like to continue to reduce the gap in performance between Māori and other students, further review the junior curriculum to integrate many of the Starpath values, reduce the size of tutor groups, implement research driven literacy strategies across the junior school and have staff working more collaboratively to share ideas and success.

Daniel Wilson, Associate Principal, Manurewa High School

Southern Cross Campus

The Starpath Project has enabled Southern Cross Campus to develop data analysis strategies that effectively influence student achievement outcomes. Through regular contact with other similar schools, we have shared ideas and gained new understandings of best practice. The support from academic personnel at The University of Auckland has been an important component of the project's success. Their contribution to sustained quality data management and strategic analysis of results established the rigor needed to make good decisions based on evidence. The main focus on increasing results in NCEA has also influenced assessment and achievement from Year 6 up to Year 10. Teachers now regularly track, monitor and target students for improvement. This has become embedded in the culture of the school at all levels.

Other communication strategies were refined so that parents and Whānau were better able to support their young people to improve achievement rates. Southern Cross Campus developed reporting and discussion opportunities so that all members of the school community are united in their goals and aspirations.

The Starpath Project has been instrumental in raising our achievement levels to above the average decile performance for our school. We hope this continues so we can produce further benefits for our students.

Robin Staples, Principal, Southern Cross Campus



Southern Cross Campus Head Boy and Girl Jireh Seiuli and Isadora Lee-Lo.

The school benefits from its involvement in The University of Auckland Starpath programme. This initiative is based on tracking, sharing and monitoring data about student achievement and engagement. The information helps students and parents to make better choices about learning and achievement. Whānau tutors discuss student progress at student achievement conferences that are attended by the majority of parents.

(ERO Report for Manurewa High School, November 2013)

The most effective schools emphasised the importance of teachers knowing their students well and improving links with families and whānau, particularly for those students at risk of underachievement. [...] The pastoral care and support improvements included the monitoring of student achievement and providing individualised responses based on student need. There were also systems introduced to mentor students, provide career planning, improve literacy and support with students' homework.

(Education Review Office, Raising Achievement in Secondary Schools, June 2014)

Massey High School

Massey High School has had the longest association with the Starpath Project. They introduced a model of Academic Counselling in 2007 based on their deans being Academic Counsellors. The school's academic counselling programme has been of great value in monitoring and motivating students to reach their aspirational goals. Students meet with their dean at regular intervals throughout the academic year. Positive relationships with students, families and school staff have been enhanced and discussions focus on academic achievement.

The school identifies the alignment of four initiatives as having a significant role in their students' success. These are the Academic Counselling (in conjunction with Starpath), Te Kotahitanga, ART (Achievement, Retention and Transition) and the introduction of vocational academies. These have helped the school to identify individual needs and provided opportunities for the school to meet these. Such initiatives have been a means by which the school can work towards raising student achievement, students gaining appropriate qualifications and assisting students finding a pathway to employment.

A benefit of the school's data work is very clear goal setting in the Annual Plan process and there is a requirement that departmental goals reflect this. Since 2012 there has been a further expectation that individual teachers' professional goals are also connected to the Annual Plan.

Massey High School is keen to continue with Academic Counselling in conjunction with Starpath. Sustainability of the project will depend on appropriate resourcing and the goodwill of staff.

Sam Smith, Deputy Principal, Massey High School

Recent initiatives such as Starpath, the introduction of the learning advisories, and academic counselling programmes, are beginning to make a positive impact on student learning. The school is aware of the potential to further engage students and families in learning partnerships, monitor and support student progress, and encourage students to take greater responsibility for their learning.

(ERO Report for Ruawai College, September 2013)

Tikipunga High School

Following more than five years of working with Starpath, many of the initiatives have become an integral part of our everyday work and conversations. Our involvement has evolved the role of the whānau teacher, and changed the conversation from uniform and attitude to learning and achievement.

After initially being seen by some as unwelcome, the Parent-Student-Teacher conferences have become the accepted norm. Whānau and teachers have valued the extra time this format provides to build partnerships between home and school. This format fits well with our school kaupapa and continues to receive support from parents and whānau.

When Starpath began, research to us was something completed by academics at universities. The partnership with Starpath allows us to see ourselves in the research. We see how it relates to our students and how it can be used by teachers to make positive changes for students.

Achievement data, once filed in folders on shelves, is now accessible to all teachers. It is better understood and informs decisions about teaching and learning as well as the school-wide decision making process.

Rochelle Telfer, Student Achievement Co-ordinator, Tikipunga High School

Schools update: Kelston Girls' College

Kelston Girls' College, a multicultural Auckland secondary school, adopted Starpath two years ago.



Kelston Girls' College Principal Linda Fox.

Kelston Girls' College is a decile 3, all girls state secondary school located in West Auckland with a roll of about 600.

Kelston Girls' College has embraced Starpath as a tool to improve academic results as well as boost students' confidence and self-belief. Principal Linda Fox says the feeling that a student "can do it" is a very powerful tool in the learning process.

Kelston Girls' College has adopted the full Starpath programme across NCEA levels one to three in the senior school. Student, teacher and parent meetings where the three have evidence based conversations and set clear goals are held twice a year. Form teachers, subject teachers, deans and middle leaders are all involved in academic counselling and have clearly defined roles. Academic counselling conferences are held each term and all students have been tracked extensively. In Term 3 these sessions are more intensive, occurring four times during the term with regularly updated student data on the table for discussion. A number of students are kept back until December to finish internals (if they have few externals to sit or the school is doubtful about their attendance at externals). The student outcomes have been impressive, especially at Level 2 where there has been a strong focus.

With teachers equipped to conduct data-informed conversations with students, Linda says the girls have started to take greater ownership of their academic progress, and are showing increased self-belief. “Detentions are a thing

of the past at Kelston Girls' College. When students feel they are achieving, behavioural difficulties certainly decrease. Issues of stand-downs, suspensions and exclusions have almost disappeared," she says.

Kelston Girls' also had a long involvement in the Te Kotahitanga project (seven years), which enabled teachers to create a culturally responsive context to improve Māori student learning. The school uses the approach of 'rongohia te hau' which involves visiting teachers to observe teacher progress with pedagogy and building relationships. Starpath has complemented the delivery of this model well.

“The culturally appropriate relational trust which was developed under Te Kotahitanga at the school fits beautifully with the data gathering – the hard evidence that teachers can share with students. Such use of data also encourages teachers to be much more responsive about their marking and entering data (in the SMS) on a regular basis.”

Overall Linda says projects like Starpath and Te Kotahitanga, as well as the people working hard to bring these projects into schools, are wonderful tools which allow educators to actually create the types of schools that meet the learning needs of their school community.





Wayne Buckland, Principal Bream Bay College, and Paul Houghton, Deputy Principal Liston College, discussing ideas at the Starpath principals' day.

Growing leadership in Starpath schools

Practical advice delivered via workshops is helping leaders to address the problems that stand in the way of raising achievement.

The University of Auckland Centre for Educational Leadership (UACEL) joined with the Woolf Fisher Research Centre and the Starpath team in 2011 to identify and help address the leadership challenges inherent in the demanding work of raising achievement for priority students. From our early analysis, we settled on four key leadership workshops to be run with each cohort of schools based on the following theory:

1. If schools are to improve, leaders must '*join the dots*' and minimise the distractions for staff and middle leaders. Frequently, we found schools in 'overload' from too many initiatives and too little clear goal focus. Hence, we ran one workshop on *Joining the Dots* each year and challenged leaders to jointly take responsibility for joining their own dots and minimising distractions.
2. To do this work effectively, senior and middle leaders need to be prepared to discuss matters that concern them, particularly when the concerns relate to the quality of teaching, and they need to do this work in a way that builds trust. Thus, leaders were introduced to *Open-to-learning Conversations™* as a 'way of being' that can help them approach problems directly, but still build trust in the process.
3. To make improvements in outcomes, leaders need to be clear on what the priority learning problem is that they are trying to solve, and what barriers are in the way of solving that problem from the point of view of their middle leaders and their staff. To this end, we ran a workshop on *Complex Problem Solving* and taught school leaders a methodology to use on 'gnarly' problems.
4. Simple clear goal focus is associated with high performing schools. Therefore, our fourth workshop focused on effective *Annual Planning*, including how to set few, specific, and student-centred goals. We developed and shared a template that schools could use to support them in this task.

Survey results

As part of its Starpath work, UACEL had previously surveyed middle and senior leaders on their views about the barriers to improving outcomes and on their knowledge of their own school goals. In the *Complex Problem Solving* workshop, schools received an overview of the results and individual reports on how senior leaders in their own school could predict the degree of concern of middle leaders from a list of common concerns.

This year UACEL found that senior leaders underestimated nearly all the concerns of middle leaders. Five were significantly different from the actual level of concern as reported by middle leaders:

- *Low teacher expectations* was the concern for middle leaders that senior leaders underestimated most.
- Concerns about *absenteeism, behaviour, preparedness to learn* and *transience* were also significantly underestimated by senior leaders.

Interestingly, *low literacy levels* was rated as the most serious concern and barrier to achievement, and it was an item on which there was a high degree of agreement between senior and middle leaders. This common view is likely to be productive in terms of problem solving whereas the lack of common understanding about the perceived *low teacher expectations*, as reported by middle leaders, could lead to a lack of action or problem solving across the leadership groups. UACEL expects that by providing individual school reports about similarities and differences in the views of senior and middle leaders, productive problem talk could be engaged in.

Productive problem talk

Productive problem talk is the leadership skill of naming, describing and analysing problems in ways that lead to solutions. Many of the problems that underpin the achievement challenges for groups of students can only be solved by analysis of causes and active consideration of the constraints within which the problem must be solved. A good example arose in one of the workshops when a leader shared the realisation that she had been trying to solve a problem within constraints that were made by the school (the current timetable) and that if she looked at this differently, the problem may indeed be solvable. Others also realised that constraints they put in place (e.g. the composition of classes; timetable options) were contributing to underachievement in their schools.

When the effectiveness of leaders in dealing with problems was examined across the whole group of schools, senior leaders rated themselves higher than middle leaders rated them on all but one item (*transience* – none of the leaders felt they had much influence over this). The biggest gaps in effectiveness from the middle leaders' point of view were senior leaders' ability to deal with *Teaching variability*, *Student behaviour* and *Timely* access to data.

Because schools had their own customised reports about the views of senior and middle leaders in their school, they were in a position to start engaging in productive problem talk: what did the data mean? Why did one group of leaders score in a certain way? What needs to be discussed and understood in the process of finding solutions to such complex challenges? We were not privy to the details of those discussions but did hear a lot of schools questioning their own grouping and timetabling practices and the impact that those decisions were having on priority students.

In the *Annual Planning* workshop UACEL staff taught the theory of goal setting, clarified terminology, introduced a method for measuring valued outcomes of any nature, and shared a simple template to help schools with this perennial task. Once again UACEL fed back individualised information to schools about their senior and middle leaders' ability to recall their own goals and the degree to which they share *recollection of the same* goals. Typically goal knowledge was not strong. Leaders often listed different goals than those published in their annual plans. High numbers of intricate goals and targets in many plans did not help leaders to recall what it was they were supposed to be focused on. Leaders appreciated the practical guidance and individualised support to hone their planning so they could work a little smarter in the forthcoming years.

Overall, the advice that UACEL would give schools to improve their outcomes is:

- Create a stronger focus on creating a coherent environment for your teachers: doing less work well, in a focussed way, is better than doing a lot of work poorly with people working disconnectedly.
- Listen, listen, listen – to the voice of your middle leaders as well as your teachers, students and communities; if they say there is a problem, there is.
- Regard people's thoughts about problems as gifts – it is best to know about the problem and engage with what is causing it.
- Analyse your student achievement challenge without making a lot of assumptions about your current practices being 'right' – keep an open mind about 'causes'; you may need to make some fundamental organisational changes to improve outcomes.
- Plan for clarity – have a few goals that focus on your achievement challenge, clarify the *few* actions that are likely to make the *most* difference to get a lift in outcomes, and then communicate those goals consistently and often. Concentrate on *monitoring your student outcomes every term*. If you are not getting a shift, your theory for improvement is wrong – reconsider your strategies for improvement.



Mark Broadwith, Dr Linda Bendikson and Tom Webb of The University of Auckland Centre for Educational Leadership (UACEL).



Literacy project delivering promising results

Starpath partner the Woolf Fisher Research Centre reports on its work with teachers to advance literacy skills in the crucial final years of schooling.

The literacy skills and knowledge students need to succeed become more sophisticated and more subject-specialised as they advance through, and beyond, their years of secondary schooling. The aim of the literacy component of Starpath, led by Aaron Wilson from the Woolf Fisher Research Centre, has been to work in partnership with schools and teachers to build students' capability to meet these complex literacy demands.

Our work with schools begins with a profiling phase in which we analyse student achievement data and observe classroom teaching in Year 12 subject areas. The profiling information is discussed with schools and used to design tailored professional learning and development (PLD). The literacy PLD has two strands. The first strand has a cross curricular focus and is delivered in partnership with UACEL. The second strand is subject specific and consists of separate workshops for English, mathematics and science teachers. Group A schools took part in the literacy PLD during 2013 and Group B schools are participating during 2014.



Dr Aaron Wilson of the Woolf Fisher Research Centre.

Positive changes in literacy teaching

Analyses of observations conducted in Group A schools before and during/after the literacy PLD indicate positive shifts in literacy teaching. In 2012, a total of 49 teachers from 10 Group A schools were observed. In 2013 a total of 61 teachers from 13 Group A schools were observed. Aspects of literacy teaching observed in alternating three-minute blocks are recorded, providing a 50% sample of each lesson.

The 2012 observations indicated that, overall, students had fewer opportunities to read and write rich written texts than we judged to be optimal. However, between 2012 and 2013, the percentage of blocks in which students read written texts increased by 25% in English, 18% in mathematics and 15% in biology. There was also an increase in the average length of texts students read in each subject with a noticeable decrease in the use of texts fewer than 50 words and an increase in texts longer than 50 words. Figure 1 shows changes in the length of texts students read in English before and after the literacy PLD.

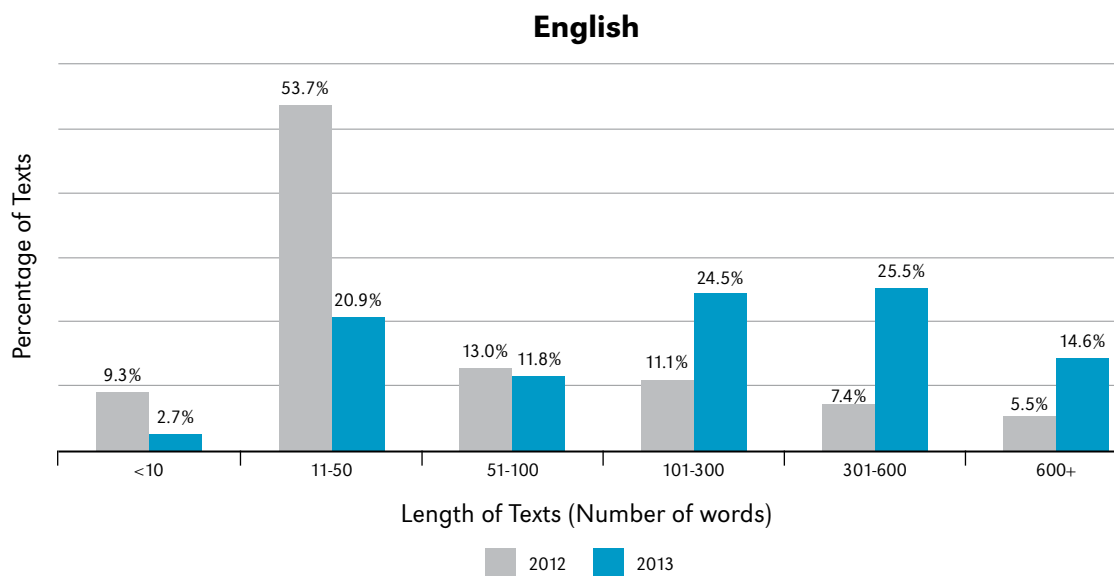


Figure 1. Length of the texts (as number of words) as a percentage of observed texts in English classes in 2012 and 2013.



In 2012 we had identified that most of the texts Year 12 students were observed to read were teacher designed materials such as whiteboard notes, PowerPoint presentations and tasksheets, rather than the more 'authentic' texts indicated in the New Zealand Curriculum. Again, there was a positive shift in the types of texts observed after the PLD, particularly in English. See Figure 2.

The second round of observations showed more teaching about text structure and developing students' own strategies for reading and writing but little increase in the opportunities for student-centred talk about texts or for developing critical literacy.

Observation data are currently being collected in Group B schools and further analyses investigating the relationship between teacher observations and student achievement are underway.

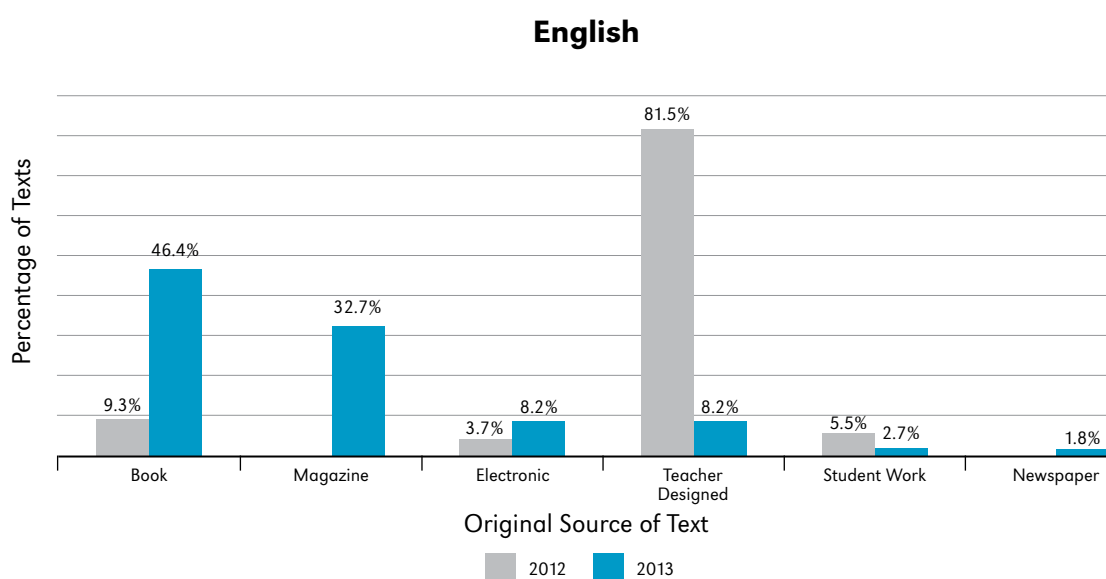


Figure 2. Original source of the texts as a percentage of observed texts in English classes in 2012 and 2013.



Research summaries

Year 9 and 10 baseline data

Our researchers have been establishing a baseline database as an important first step in the Year 9 and 10 extension to the Starpath Project. These data have been provided by the student achievement managers in each of our partner schools, who upon joining the Project have collected and collated data not only on NCEA, but also for Years 9 and 10. The data mainly consist of e-asTTle or PAT scores for reading/ listening comprehension and mathematics collected at the beginning and end of each school year, as well as demographic data about the students (e.g. gender and ethnicity). After aggregating and matching the data, we arrived at a database with over 100,000 students to use as the baseline, which has now been shared with all Starpath partner schools.

In our analysis of these data we paid particular attention to two key points in the students’ schooling - entry to Year 9, and exit from Year 10 - and looked at the proportion of students who were below the curriculum expectation at those times. Students are expected to be at Level 4 of the curriculum on entry to Year 9, and to have a reasonable chance of success in NCEA Level 1 (which is now re-aligned to Level 6 of the curriculum) to be at Level 5 as they enter Year 11.

		Entry to Year 9		Exit from Year 10	
Domain	Ethnicity	Total number of students assessed	Percentage at or below Level 3	Total number of students assessed	Percentage at or below Level 4
e-asTTle Reading	Māori	8179	56.3%	4404	67.6%
	European	6652	28.5%	4143	39.4%
	Pasifika	8201	70.4%	4485	79.2%
	Asian	2830	51.7%	1904	63.2%
e-asTTle Maths	Māori	6875	69.4%	3078	73.7%
	European	5850	40.4%	3762	47.4%
	Pasifika	7298	79.8%	3727	81.6%
	Asian	2591	53.5%	1582	57.5%

Table 1. Percentage of students below curriculum expectation in reading and mathematics on entry to Year 9 and exit from Year 10, by ethnicity.

With the clear exception of European students on reading, at least a half of all students in Starpath schools are behind the expected curriculum level right through these two years of preparation for NCEA. Indeed, for every group on both reading and mathematics, the percentage of students below the expected curriculum level increased between the beginning of Year 9 and the end of Year 10. For reading, the average increase was almost 11 percentage points, while for mathematics the average increase was just over four percentage points. We have now started working with schools to accelerate progress in reading and mathematics through these two foundational years.

For PAT results, we examined the percentage of students with a stanine of 4 or below. This would place the students in the bottom 40% of a nationally representative sample. The PAT tests are usually administered

at the beginning of the school year, so the data are for entry to Year 9, and a year later on entry to Year 10. Table 2 shows the results only for Listening Comprehension, a domain which is not covered by e-asTTle. Observation data obtained as part of the Starpath literacy programme show that students spend about 40% of their time in the classroom listening to either the teacher or their peers. The very high proportion of Pasifika and Asian students and high proportion of Māori students who do not fully comprehend what they are hearing is of great concern, and schools are being advised to seek strategies that address this.

Further analysis is underway to examine more closely the relationship between junior school data and performance on NCEA.

Domain	Ethnicity	Entry to Year 9		Entry to Year 10	
		Total number of students	Percentage at or below stanine 4	Total number of students	Percentage at or below stanine 4
PAT Listening	Māori	988	66.8%	768	62.8%
	European	1278	29.7%	1373	28.9%
	Pasifika	902	91.4%	674	93.3%
	Asian	466	81.3%	398	81.9%

Table 2. Percentage of students at or below stanine 4 in Listening Comprehension on entry to Year 9 and entry to Year 10, by ethnicity.

Science strand 2014

Over the past 12 months our researchers have been piloting a science intervention in six Starpath schools. Science: Thinking with Evidence (STwE) is a standardised science assessment tool. It grew from a concern about the access and availability of junior data for decision-making in science departments. Schools continue to show a wide variation in the way junior science achievement data are collected. The rationale for the STwE is to allow junior science teachers to gather a consistent and comparable set of evidence about their students' performance and to build teachers capacity to use these data for planning and decision-making within the science department. This invariably complements the Starpath DUACTS approach, with a focus on building quality data, and their use within a subject that has often been overlooked in measuring student achievement.

To date, about 2300 students from the six schools had taken the STwE and four science departmental workshops have been conducted in the respective schools. The workshops consisted of an overview of the assessment tool, how to analyse and interpret the scale scores and how to use the diagnostic reports on the NZCER website. Teachers were able to use real time data from their classes to engage in discussion for their instructional programmes.

An initial analysis of the Year 9 data revealed that a number of students enter secondary school with a very limited understanding of scientific evidence and their use. This was evident in low scores on the STwE test administered at the start of the year as compared to the average score of a national group of students who sat the same STwE test. We found that some students entering Year 10 had also been underperforming in terms of scientific thinking using evidence. This evidence provided teachers with reliable information to engage in collaborative dialogue on how to better improve their students' knowledge and skill in using scientific evidence. Instructional strategies discussed included the use of scientific inquiry resources on the TKI science website, explicit instruction on thinking skills in science and incorporating elements of interpreting tables and graphs in practical work.



Kylie Jenkinson.

Masters study looks at high achievers

Much of Starpath's work in schools is centered on academic mentoring sessions. Although academic mentoring caters for students of all academic abilities, often high-achieving students miss out.

As part of her Masters dissertation, Kylie Jenkinson examined the perceptions of a group of high achieving Year 11 students selected to take part in academic mentoring. Another group of randomly selected Year 11 students also took part to provide comparison.

In particular, Kylie explored whether or not high-achieving students required differentiated content in their academic mentoring programme given that they showed the potential to achieve at or better than the national average. Kylie also looked at the link between academic mentoring and resiliency.

Kylie's research highlighted two key areas: effective academic mentors and the quality of academic advice.

Students who felt their mentor cared about their achievement were more likely to open up and be receptive to advice and guidance. The students appreciated having one person they could go to for academic guidance. Importantly, academic mentoring empowered them to feel they were in control of their educational journey, not just a participant.

Although the development of the relationship was central, the quality of the advice and academic information was an important factor for the students. This information combined with high expectations and encouragement to continue to aim high was considered extremely motivating and influential.

Overall, the study found no differentiated programme was required for these students, however mentors need to understand all aspects of NCEA to ensure they give accurate advice to those students who have the potential to excel.



Project outputs

(1 July 2013 - 30 June 2014)

Published articles

- McKinley, E. & Madjar, I. (2014). From schools in low-income communities to university: Challenges of transition for Māori and Pacific students. In, Māori and Pasifika Higher Education Horizons – Diversity in Higher Education (Vol 15), Cram, F., Phillips, H., Sauni, P. & Tuagalu, C. (Eds). Bingley, UK: Emerald Group Publishing Ltd. (pp. 241-252).

Conference presentations

- Irving, S.E., Santamaria, A. P., Gan, M. & Thorogood, L. Data Use in Secondary Schools: Results of a Teacher Survey. Paper presented at the Social Psychology of the Classroom International Conference, Auckland (15 July 2013).
- Gan, M., & Irving, S. E. Factors influencing junior secondary students' mathematics achievement – Do attitudes towards reading, cognitive processing at surface/deep levels and reading ability matter? Paper presented at The 2013 Joint SELF Biennial International Conference and Educational Research Association of Singapore (ERAS) Conference, Singapore (9 September 2013).
- Webber, M. The Starpath Project: Pathways and opportunities to learn. Bridging the Divides Conference. Auckland (2 July 2013).
- Eaton, J. COMET Auckland: Communicating Learning Forum, Ellerslie, Auckland, 16 May 2014.

Other presentations

- Professor McKinley, Drs Mark Gan and Earl Irving - Starpath presentation to delegation of Swedish educators, Faculty of Education, Epsom Campus, 19 March 2014.

Starpath seminars, workshops and lectures

- Joy Eaton delivered a lecture introducing Starpath to EDPROFST 612, Faculty of Education, 10, 11 March 2014.
- Drs Earl Irving and Mark Gan conducted one-day training workshop for new SAMs, Whangarei, 17 September 2013.
- Starpath presentation to delegation from Oman Ministry of Education, prior to school visits, 31 October 2013.
- Starpath presentation to delegation from Oman Ministry of Education, 'e-asTTle and assessment processes in New Zealand', 1 November 2013.
- Dr Earl Irving and Professor Liz McKinley, 'Starpath and use of data', Te Kura (The Correspondence School), Wellington, 15 October 2013.

Starpath Toolkit

- McKinley, E. & Madjar, I. (2013) Understanding NCEA: A relatively short and very useful guide for secondary students and their parents. (2nd ed) Wellington: NZCER Press.
- McKinley, E. & Madjar, I. (2013) Malamalama i le NCEA: O se taiala pu'upu'u ae sili ona aoga mo tamaiti o aoga maualuluga ma o latou matua (2nd ed), (Samoan translation by Faimai Pisu Tuimauga). Wellington: NZCER Press.

Starpath Wikispace

- The private Starpath Wikispace continued to support partner schools with information, presentations and resources. There were 1696 unique visitors in 2013 and 122 registered members. In 2014 the Wikispace averaged 80-100 unique visitors a month.

Starpath Events

- Starpath Principals' Day, Novotel Hotel Ellerslie, 3 July 2014.

Ministerial meetings and visits

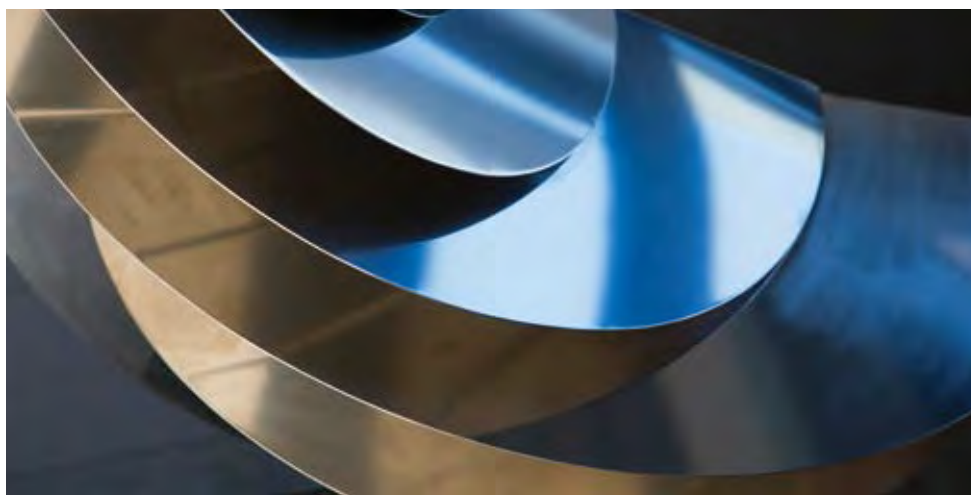
Ministerial Cross-Sector Forum (MCSF) on Raising Student Achievement

- Professor McKinley attended MCSF subgroup meeting 2 October, 1 November 2013.
- Professor McKinley attended MCSF, Wellington, 4 December 2013, 28 February, 27 April, 15 May 2014.
- Professor McKinley co-chaired MCSF, 4 December 2013, 28 February 2014.
- Professor McKinley co-chaired sub-group, Wellington, 17 April, 29 May 2014.
- Professor McKinley attended Benchmarks for Progress (a subgroup of the MCSF) meeting, 6 December 2013, 17 February 2014.
- Professor McKinley met with Lisa Rodgers (Deputy Secretary Evidence, Data & Knowledge) and Lynne Whitney (Group Manager Research) regarding the Ministry liaison for Benchmarks for Progress, 24 January 2014.
- Professor Graeme Aitken attended MCSF, Wellington, 15 May 2014.

Meetings with Ministry of Education

Meetings were held with the Ministry of Education on numerous occasions including on 19 September; 10, 15, 31 October; 6, 7, 12, 13, 25 November. Some specific meetings were:

- Professor McKinley and Dr Earl Irving met Ralf Engler, MoE Tertiary Sector Performance Unit, to share report on Transition to Tertiary for students from Phase 2A schools, and prepare for next data collection, 15 October 2013.
- Professor McKinley met with Rowena Phair, Deputy Secretary Student Achievement, Ministry of Education, 15 October 2013.
- A number of staff from Starpath and the Woolf Fisher Research Centre met Ministry officials and ten representatives of Starpath schools to discuss Years 9 and 10, and the Ministry's Parent Achievement Information plan, 17 October 2013.
- Dr Earl Irving and Professor McKinley met Emily Mason (MoE, Wellington) on the PAI Plan. 21 October 2013.



- Meeting with Peter Hughes (Secretary) with Professors Aitken, Robinson and McNaughton, regarding recent policy announcements “Investing in Educational Success”, Wellington, 5 February 2014.
- Meeting with Graeme Stoop (Deputy Secretary) with Professors Aitken, Robinson and McNaughton, regarding recent policy announcements “Investing in Educational Success”, Auckland, 13 February 2014.
- Professor McKinley met with Deputy Secretary, Dr Graham Stoop regarding Investing in Educational Success. 6, 13 April 2014. Professors Aitken, McNaughton, Timperley, Distinguished Professor Robinson met with him over several meetings.

Meetings with other government agencies

- Professor McKinley met with Labour spokesperson for education Chris Hipkins, 23 September 2013.
- Professor McKinley met with the Teaching and Learning Research Initiative Board, 1 October 2013.
- Professor McKinley met with Green Party co-leader Metiria Turei, 4 November 2013.
- Professor McKinley met with Louisa Wall, MP for Manurewa, 16 December 2013.

Meetings with government delegations

- Professors McKinley and McNaughton met with the Scottish Delegation to the International Teaching Summit held in Wellington and hosted by the NZ Government. In attendance were: Michael Russell MSP, Cabinet Secretary for Education and Lifelong Learning in the Scottish Government; Ken Muir, Chief Executive, General Teaching Council for Scotland; Ian Mitchell, Deputy Director, Scottish Government Learning Directorate; Larry Flanagan, General Secretary of the Educational Institute of Scotland; Ellen MacKinnon, Private Secretary to the Cabinet Secretary for Education and Lifelong Learning; and Yvonne Davidis, Political Officer, British High Commission, 25 March 2014.

Other meetings and events with key stakeholders

- Dr Earl Irving met with Catherine Dunphy and colleagues from The University of Auckland Equity Office to discuss the use of data for tracking and monitoring Māori and Pasifika students at the UoA, 29 August 2013.
- Dr Earl Irving and Joy Eaton met with Edith Chaney (He kakano) and Nicky Glasgow (Team Solutions) to discuss data at Sir Edmund Hillary Collegiate, 23 August 2013.

- Dr Earl Irving, Joy Eaton and Dr Mark Gan met with the senior management team at Sir Edmund Hillary Collegiate to track student progress in 2013 compared with 2012 and 2011. Edith Chaney (He Kakano), Colleen McGuinness (MoE’s Student Achievement Facilitator) and Nicky Glasgow (Team Solutions) also present, 2 September 2013.
- Professor McKinley attended Manurewa High School ERO visit as Friend of the School, 16 September 2013.
- Dr Earl Irving met Michael Loretz, Deputy Principal at Mt Roskill GS, regarding a computer routine that produces a comprehensive student profile for Academic Counselling and PST conferences, 3 October 2013.
- Dr Earl Irving met Glenys Brown (SAF) and Edith Chaney (He Kakano) in Whangarei to discuss streamlining the data collection processes at Broadwood Area School, 14 October 2013.
- Professor McKinley met with Terrance Wallace (The In-Zone project for Auckland Grammar), 17 September, 5 November 2013.

Project media coverage

(1 July 2013 - 30 June 2014)

- *School absences ‘can affect students for life’.* Professor Liz McKinley comments in the *New Zealand Herald* on long-term school absences for at-risk youth, 6 September 2013.
- Professor Liz McKinley discusses the release of the second edition of ‘Understanding NCEA’. *Radio NZ, Nine to Noon*, 3 October 2013.
- *\$31m to lift Māori educational results.* Starpath is named as one of the initiatives involved in the new Building on Success programme, launched by Education Minister Hekia Parata in Gisborne. It combines the best from Starpath and other selected educational programmes to deliver a comprehensive package which is expected to significantly raise achievement for young Māori. *Fairfax, The Dominion Post, Wanganui Chronicle*, 29 November 2013.
- *NZ education facing a bad report.* Hekia Parata signals that a “myriad programmes and their funding designed to support improved performance by Māori in education, such as Te Kotahitanga and Starpath, would be folded into a single programme called Building On Success” in an article anticipating NZ’s drop in PISA educational rankings. *New Zealand Herald*, 29 November 2013.
- *Closing the gaps: Māori-Pacific report card - Good but could do better.* Interview Professor Liz McKinley. *New Zealand Herald*, 19 March 2014.
- *Insight Pasifika Education* (features interview with Professor Liz McKinley). *Radio NZ Sunday Morning*, 2 March 2014.
- *Achievers show young people the way.* Interview Melinda Webber. *The Daily Post (Rotorua), New Zealand Herald*, 22 February 2014.



Future directions

The next 12 months

While Stage 2 of the Starpath Project will finish at the end of 2015, the work in the next 12 months will see Starpath staff as busy as ever.

In the next six months the team will complete evaluation interviews and focus groups with students and staff in the 18 Group B schools. Last year we carried out 117 individual interviews and 67 focus groups (consisting of 249 students and 147 teachers) for Group A schools. In addition, the quantitative team will regularly visit schools to monitor any issues around tracking and student progress, target setting, and generally to support data analysis. The reports resulting from this work contain the information on which the following year's work programme will be based. The evaluations highlight areas of strengths and weaknesses for each school and enable us to be more specific in targeting professional learning support.

Starpath will continue to work with the Ministry of Education over the next 12 months. The *Starpath Extension: Years 9 & 10* Project continues until March 2015. This will ensure the participating schools get access to subject specific literacy workshops and individual school visits, assistance with developing academic counseling targeting Year 9 & 10 students, and further support in working with junior school data.

Furthermore *Kia Eke Panuku: Building on Success* is another MoE contract to which the Starpath Project is contributing. The MoE established this project with the intention of bringing together the findings from Starpath with other projects shown to raise Māori student achievement. The work for the Starpath team in this project will be about sharing their knowledge and skills with the facilitators in the *Kia Eke Panuku* team.

Reporting on the Starpath Project Stage 2 will be a high priority next year. The culmination of five years of work with the Stage 2 schools will be a testing time for all of us as we ask if we have made a difference for Māori, Pacific, and other students from low-mid decile schools, and if so, in what ways.

Beyond 2015

While Starpath is nearing the end of the second stage of its original proposal, the University does not consider that its contribution to achieving better outcomes for students throughout their years in education is completed. We will always have an interest in seeing that students reach their goals – whether they are university study, a Polytechnic degree or diploma, or a fulfilling role in work or the community.

The University considers that the lessons it has learned and the partnerships it has forged through Starpath with schools, the Ministry of Education and stakeholders must be continued. Over the coming year the University will be discussing ways in which Starpath activities can be sustained and how it can maintain a role in furthering equity and excellence in education.



Starpath

A University of Auckland Partnership for Excellence





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Contact

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