Law graduate Chris McKee (front) and Sport Management graduate Creag Robertson competing for Stirling University FC in the William Hill Scottish Cup. Gifted footballers receive scholarship support, helping them return to the professional game and gain a quality degree for life beyond their football careers.
As Scotland’s University for Sporting Excellence, our mission is to deliver the best for Scottish sport through the powerful and inspirational combination of sport and education.

We are at the heart of Scottish sport, preparing athletes to perform on the world stage, enabling students to develop their skill sets for excellent careers and producing innovative research to improve the health of the nation.

Our sport-centred campus is the hub of the local community and brings together the people shaping Scottish sport, creating a critical mass of sporting expertise and excellence.
Graduate Khym Ramsay visits the library whilst at the Scottish FA National Performance Centre for Women’s Football.
The University of Stirling is recognised nationally and internationally as a University of distinction which enables individuals to fulfil their potential and contribute to prosperous, healthy and sustainable communities.

Central to achieving this is the successful fusion of sport and education. Core principles of sport – determination, self-discipline, respect and fairness – are also fundamental life skills developed through education.

When Stirling was designated as Scotland’s University for Sporting Excellence, we set out our vision to shape the future of Scottish sport and, as the nation prepares to host further major sporting events, we are proud to continue to play our part.

This report provides you with a snapshot of the story so far, from investment in athletes, coaches and facilities to leading on research and teaching.

Teamwork is what makes for success on and off the sports field. Our relationship with the local community and through the many partnerships we have developed, ensures knowledge and expertise are shared.

Stirling was founded on innovation and excellence and we will continue to work tirelessly to contribute towards a successful sporting future for Scotland.

Principal’s welcome

Professor Gerry McCormac
Principal and Vice-Chancellor
The University of Stirling:

- 1st in Scotland and 8th in the UK
  *The Times Higher Education 100 Under 50, 2012*

- 87% student satisfaction rate
  *National Student Survey, 2012*

- 83% of our graduates in employment after six months
  *Higher Education Statistics Agency, 2011*

In sport:

- 1st in Scotland for sports research
  *Most recent Research Assessment Exercise, 2008*

- 1st in Scotland for Sport and Education
  *The Times Good University Guide, 2012*

- 1st for sports facilities
  *International Student Barometer, 2012*
Charting excellence
Our journey

INTERNATIONAL SPORTS SCHOLARSHIP PROGRAMME 1981
Colin Dalglish was the inaugural recipient of a sports scholarship, going on to represent and captain Great Britain and Ireland in golf’s Walker Cup. Since then around 800 students competing in five sports have received support, including European Tour golfer Richie Ramsay, pictured.

GANNOCHY SPORTS CENTRE OPENS 1969
The first university sports centre in Scotland to open its doors to the community, its facilities are still in high demand, with more than 125 weekly classes for children and older adults as well as being the base for 40 student sports clubs.

A SPORTING EDUCATION 1995
Responding to the need to deliver degrees relevant to young people, we introduced undergraduate courses in Sports Studies and modules in the science, culture and management of sport. There soon followed the first professor of sport and five years on, the establishment of a Department of Sports Studies.

SUPPORTING SPORTING INNOVATION 1986
Stirling University Innovation Park opened for business. It is now home to The Sporting Chance Initiative, enabling companies to make the most of commercial opportunities in sport and helping them tap into University research expertise.

MAKING A RACKET 1991
The Scottish National Tennis Centre was developed on campus, since extended to ten indoor and outdoor courts. Home to the national performance development programme, it is a former training base for Olympic gold medallist Andy Murray and Davis Cup team-mate Colin Fleming, pictured.
THE DESIGNATION

Stirling is designated Scotland’s University for Sporting Excellence by the Scottish Government. Announcing the designation, Fiona Hyslop, Cabinet Secretary for Culture and External Affairs, said: “Stirling is widely recognised as an institution that has sport very much at the heart of its identity, making it the ideal choice.”

SPORTING NETWORK

National sports scholarship programme Winning Students supported 85 students athletes in its first year and now helps more than 150 aspiring World, Commonwealth and Olympic competitors studying across Scotland, including World Junior Curling medallists.

DELHI DELIGHTS

The Delhi 2010 Commonwealth Games featured 14 current and former Stirling students and a further 23 students from the Winning Students network, with a return of two gold medals and one silver placing the scholarship programme equivalent to 18th place in the final standings.

LONDON CALLING

Eight athletes and three members of staff represented the University at the London 2012 Olympic and Paralympic Games, where Marketing graduate Gavin Noble made history as the first Irishman to compete in an Olympic triathlon.

WHAT’S NEXT?

Visit page 28 to discover our future priorities at Scotland’s University for Sporting Excellence.
Children perfect their canoeing skills on the University loch, following in the footsteps of former Olympic silver medallist Campbell Walsh.
Visit the University Sports Centre and you might meet a professional footballer, a PGA qualified golf coach or a swimming pool receptionist. You might also meet the Chief Executive of Commonwealth Games Scotland, the Head of Performance Lifestyle at the sportscotland institute of sport or the entire national triathlon squad.

Stirling is a home for sport, with national training centres, governing bodies of sport, academic researchers, athletes, coaches and sports administrators working side-by-side. It’s a team effort and working together we are able to inform policy, develop sporting talent and share best practice.

Our campus partners:
- sportscotland institute of sport
- Commonwealth Games Scotland
- Scottish Gymnastics
- Scottish FA Central Region
- Scottish Swimming
- triathlonscotland
- Falkirk FC
- Central Sporting Partnership

Sport at Stirling is a community affair with students, staff and local residents – young and old – all enjoying the benefits of physical activity together.

Each week:
- 620 children attend sports classes in golf, gymnastics, swimming, tennis and trampolining
- 120 older adults participate in our Young at Heart programme
- 375 students, staff and members of the community enjoy our fitness classes

Each year:
- Around 5,000 members use our Sports Centre facilities
- 1,500 students participate and compete against other universities
- Almost 1,000 children come to our holiday sports classes
- 700 pupils from Clackmannanshire, Falkirk and Stirling schools hold their school sports days on campus
- 200 pupils are trained as young volunteers through Lead 2014, a partnership between Glasgow 2014 and the Youth Sport Trust
- 25 weeks of work placements are offered to school pupils, local college students and students at the University
Scotland Rugby international Sarah Dixon is put through testing at the University’s High Performance Sports Science Centre.
Marc Austin, pictured right
European Junior Relay Gold medallist

“...I am aiming to be selected for the Glasgow 2014 Commonwealth Games and I’m delighted to be able to stay in Scotland to work towards my dream.”

Have you ever raced a cross-country skiing event on a treadmill or had 10 infrared cameras watch you in 3D?

These are just two of many activities taking place in a new state-of-the-art sports science and medicine centre in Stirling, with the knowledge gained helping Scotland’s elite athletes to perform on the world stage.

The facility is the first of its kind in Scotland and has been established through a joint partnership between the University and the sportscotland institute of sport.

From a high velocity treadmill with built in gps designed for skiers, cyclists and athletes in wheelchairs, to a bio-mechanical analysis room using infrared cameras to analyse sporting technique, the laboratories and adjacent sports medicine and physiotherapy areas are in full effect thanks to a collaborative approach.

As Dr Malcolm Fairweather, the institute’s Head of Science and Innovation, explained: “Working together with the University research staff has enabled us to harness our expertise and answer key questions. I am sure these facilities and the surrounding services will have a significant impact on our elite athletes, not least by providing alternative training opportunities in Scotland.”

It is open to athletes in the institute network and to students on the University’s sports scholarship programme, many of whom are one and the same, such as leading junior triathlete Marc Austin.

The Stirling Applied Mathematics student has twice represented Great Britain at the European and World Championships, winning a medal in the Junior Mixed Relay.

Marc said: “I am aiming to be selected for the Glasgow 2014 Commonwealth Games and I’m delighted to be able to stay in Scotland to work towards my dream. The new sports science facility will enable me to gauge exactly how my training is improving my performance level. The support team at Stirling gives me the confidence that I am getting all the information and education I need to be the best.”

As with all sports facilities on campus, sports clubs and members of the local community are able to tap into the sports science set-up, not least through a dedicated sports injury clinic.

Inspiring performance
Lewis Smith, pictured training at the National Swimming Academy on campus.
5.30am. A piercing shrill sounds from the alarm clock. The snooze button isn’t an option for swimmer Lewis Smith, with 140 lengths of the 50m pool and an hour in the gym to squeeze in before his first lecture of the day.

There’s another 140 lengths and more land conditioning in the afternoon too, repeated six days a week for the 24-year-old Stirling student, in his final year of a Sports Studies degree.

The proud Scot is putting in the hours – around 35 a week – driven by the opportunity to compete in his home country at the Glasgow 2014 Commonwealth Games.

“In swimming, the Commonwealth Games is the only time you get to compete for Scotland so it would mean a lot. I’ve never found it too difficult to be motivated as I know if I don’t put the hard work in and keep improving now then I won’t make the team in the future,” said Smith.

Lewis is not alone in his hectic schedule combining study and sport – indeed the length and breadth of the country, early morning alarm clocks can be heard as hundreds of gifted young students hit the water, the mat, the court and even the ice before the library and the lecture theatre.

Helping them along the way is Winning Students, established in 2009 when the University of Stirling was selected by the Scottish Funding Council to run a national sports scholarship programme for student athletes.

Now, the programme currently supports more than 150 athletes across 19 sports – eight of which are part of the Glasgow 2014 sport programme.

Eleven members of Team GB at the London 2012 Olympic and Paralympic Games were current or former Winning Students, collecting two medals for the team tally. And a further 25 Winning Students represented Team Scotland at the Delhi 2010 Commonwealth Games.

Students are spread across a network of more than 30 colleges and universities, ensuring they can access vital funding support and academic flexibility no matter where they choose to base themselves.

Partnership working with national governing bodies of sport has culminated in the creation of campus-based national training centres, a lasting legacy beyond the next major Games.

For Lewis, a medal winner at the Delhi 2010 Games, the degree scroll will be further reward for his hard work and dedication. He said: “Your sporting life doesn’t last forever, especially for swimmers, so studying is important for me once my career finishes. There is no job I will do which will be as good as being a swimmer but if it can be even half as good then that’ll do fine.”
Applied Mathematics student Jack McDonald was crowned Scottish Amateur Golfer of the Year after a phenomenal season saw him finish as the highest-placed amateur at the Scottish Open, a European Tour event.
“We know diseases like diabetes and conditions such as obesity are on the rise,” said Dr Colin Moran, a Lecturer in the School of Sport, “but our genetics have not changed. For the first time in human evolutionary history we’ve got 24-hour access to food and many of us are leading sedentary lifestyles. Our environment has changed and this has uncovered our genetics.”

Dr Moran works with elite athletes and the general public to analyse the relationship between genetic and environmental differences, and the development of athletic ability, obesity, diabetes and muscle function.

One of his research interests is epigenetics – or how our DNA is ‘packaged’ by proteins. This area of study analyses how the structuring of DNA affects the ‘expression’ of particular genes. Unlike our genetic profile, with which we are born and cannot alter, an interesting feature of epigenetics is that they can be altered by external factors like exercise.

Dr Moran’s research has shown people’s responses to specific types of exercise are intrinsically linked to their genetics and epigenetics.

He added: “If a group of subjects follow an exercise programme, the majority will benefit, but a minority may not and some may even experience detrimental effects. However, this same minority group shouldn’t be jettisoned to the health scrapheap and considered incapable of improvement; they just need an exercise programme targeted specifically for them.”

His research has shown exercise is more important for some than others. A recent high profile example of this, he says, is the difference in training styles attributed by the media to Usain Bolt and Yohan Blake during the London 2012 Olympics. It was speculated that Blake had had to train much harder than Bolt and that, despite this, Bolt was still in a better position to win because of superior athletic genes.

However, Dr Moran emphasises good genes are not everything: “You could possess the genetic material to be the best sprinter in the world, but it wouldn’t do any good if you sat on the sofa all day. It’s about the combination of both genes and training and establishing what works best for each individual.”

Crucially, his research has proven even those with a family history of diabetes can be as healthy as those with no genetic predisposition to the disease. “In the future, we’ll be able to match people to health programmes based on their unique genetic profile, to achieve the best possible results for the least effort.”
Angus Morrison tackles the hurdles in style during an athletics class at the University.
The value of sport

“There is a perception that sport can improve health, generate economic benefit, reduce crime, increase educational attainment and build stronger communities,” said John Taylor, Research Fellow in the School of Sport. “But, until recently, a comprehensive review of the benefits of sport had not been fully explored.”

In 2003, Professor Fred Coalter, now retired from the University, began a project to assess systematically the evidence of the benefits of sport through the Value of Sport Monitor, a study commissioned by Sport England and UK Sport.

Today, this project has led to the creation of the Value of Sport Monitor, an online monitoring service of the most up-to-date reference sources, as well as critical reviews of published research about the contribution of sport to a range of broader social issues.

Covering everything from crime reduction, community regeneration and education to health, wellbeing and social cohesion, the Monitor aims to provide the best evidence available, helping policy makers and practitioners to deliver what works best.

John added: “Policy makers will already have some familiarity with the effect of sport on various aspects of social and economic life, but we want to ensure that this material is accessible specifically to non-sport and non-academic audiences too.

To help them, we should be able to produce a summary which consolidates all that we have learned from the available hard evidence.”

Its value has been recognised internationally and is used by sport organisations worldwide, including the Australian Sports Commission, and closer to home, sportscotland. They have recently commissioned the University to develop further its potential in informing priorities on where to invest in sport to ensure it has the greatest impact.

Importantly, the monitor also highlights challenges with the definitions of terms used in sport and identifies the need for more robust research into the benefits of sport. “The Value of Sport Monitor is an excellent resource for academics, students, sports practitioners and policy makers,” concluded John. “It can help raise the quality of debate in sport and is a useful resource for determining research agendas.”
Sunghee Park, a former Olympic and World Tour tennis player, is using her PhD research completed at Stirling in her new role as a sports psychologist.

“I would like to develop an education programme to prepare athletes for their career transitions, while also helping them to develop a good work-life balance.”
Researchers at Stirling believe walking could play an important role in fighting depression, a condition which affects as many as one in 10 British adults at some point during their lives.

Physical exercise is recommended as a treatment option for people with mild depression, but a study led by health researchers from the University’s Centre for Public Health and Population Health found even a basic activity such as walking can have a positive effect.

The researchers identified and analysed data from eight studies considering the impact of walking interventions on a total of 341 patients.

Roma Robertson, a Stirling PhD student, worked with colleagues at the University of Edinburgh. She said: “We found that walking has a statistically significant, large effect on the symptoms of depression in some populations and is as effective as other forms of physical activity.

“People working in primary care have a limited range of options as to what they can offer people with depression and treatments such as anti-depressants aren’t always effective and come with potential side-effects.”

Stirling’s own scenic campus is already home to a number of walking groups, including for postnatal mums, and is Ramblers Scotland’s first Medal Routes Walking Hub, a national healthy living project inspired by the Glasgow 2014 Commonwealth Games.

Stirling’s core research strengths lie in: sport; culture and society; environment and communities; enterprise and economy and health and wellbeing.
An unlikely sport is helping to build social capital and address a number of deep-rooted societal problems in one multi-cultural Scottish community.

Gaelic Football is the focus of a project in Coatbridge which has been trying to transform lives by challenging the barriers which inhibit young people from fulfilling their potential.

The Active Communities project was first established with the aim of addressing the damaging health and family breakdown statistics which besmirch this post-industrial town.

Dr Joe Bradley, an authority in researching sport’s relationship with identity, culture, religion and ethnicity also happens to be a keen Gaelic Football player. He delayed his planned retirement from the sport to lend his leadership to the project.

“Vibrant sports activities, participation and volunteering provide alternatives to what gives rise to many of these social problems in the first place,” said Bradley, a Senior Lecturer at Stirling and qualified school teacher.

“The intention is that pupils learn positive habits in relation to communication, health, fitness and social aspirations. The sport also helps them to make positive decisions and not only to keep good company, but also to create it in a stable and supportive setting.”

Gaelic Football activity in Coatbridge has grown to become the biggest minority sport across North Lanarkshire and the largest regular sporting activity in Coatbridge primary schools and beyond.

Each week, 500 pupils aged nine to 16 receive coaching as part of their school timetable, with a 98 percent participation rate recorded. For many pupils, it represents their first and only experience of being coached to play a competitive team sport and being able to represent their school at sport.

Bucking the trend of declining sporting participation, the project has led to a thriving club scene outside school time and a packed activity calendar with Gaelic Football from spring to early winter and handball offered through the off-season.

The results on the pitch are there for all to see, with 18 of the 20-strong Scotland boys’ squad competing at the 2012 Feile World U14 Championships in Ireland coming from Coatbridge whilst the Coatbridge girls were crowned 2012 Ladies British Gaelic Football Champions.

The focus, however, is not simply on winning matches.

Dr Bradley added: “When the kids come to the after-school classes they can wear whatever kit they want. They are not asked to stop being whatever they are, but simply that they and their families see the Gaelic Football environment as a space where they discover more about other individuals and appreciate that under every football strip there is a person.

“The hope is they learn to live with and tolerate other social and cultural distinctions and make friends with a range of youngsters, often for the rest of their lives.”

Dr Joe Bradley, Senior Lecturer

“Shaping society

They learn to live with and tolerate other social and cultural distinctions and make friends with a range of youngsters, often for the rest of their lives.”
Coatbridge Davitts U14 Girls admire a good season’s work in the shape of the All-Britain Gaelic Football Trophy won in London.

Coatbridge Davitts U12 Boys line out to play in a national Gaelic Football tournament held in Birmingham.
A matter of coaching expertise

Former Scotland international footballer Pauline Hamill is now coaching the next generation at the Scottish FA National Performance Centre for Women’s Football. The move from player to coach is not without its pitfalls, but Hamill has tapped into Coaching Matters, a professional development programme to brush up on her knowledge.

“To have discussions with other elite performance coaches has been very interesting as every sport can learn from each other,” said Hamill. “It is really important you stay ahead of the game and are always open to becoming better.”

I work with our most talented national team and youth players on a daily basis and I want to develop my own knowledge and in turn help them reach their full potential. Even the smallest detail is important so if I can learn from other coaches and pick up a couple of things at these courses, then it is worthwhile.”

Coaching Matters, delivered by the University in partnership with sportscotland, was established by Senior Teaching Fellow Alan Lynn, a former Scottish Swimming Technical Director. General and sport-specific workshops run throughout the year.

An informed sporting future

Doping in sport remains a contentious issue but have we learned the lessons from the past?

Dr Paul Dimeo has always been interested in exploring ethical dilemmas surrounding sport and his expertise was rewarded with a Fulbright Award, funding further research into doping activity during the Cold War.

From the state-sponsored doping programmes in the German Democratic Republic (GDR) and the USSR to the use of steroids in the USA, Canada and UK, Dr Dimeo has been analysing differences in perceptions between doping activity.

He said: "My research compares both sides of the ‘Iron Curtain’, considering factors like nationalism, the state, the role of doctors and coaches, athletes' attitudes and drug supply networks. This will provide fuller understanding of how doping developed and a more balanced appraisal of the past.

“Future research must address why athletes might be at risk of doping, and what prevents other athletes from doping when presented the opportunity. By furthering knowledge in this area, anti-doping education strategies can be more targeted and effective.”
Graduates shape an ideal future

“There’s something unique about Africa and its ability to charm you,” explains Journalism graduate Andrew Jenkin, one of several former Stirling students hooked by their Zambian experience.

Two of more than 40 Stirling students to be selected for the IDEALS project, Andrew and physical education graduate Hayley Barr both spent six weeks in capital city Lusaka in 2009.

A UK Sport initiative, it sees sport and media students trained to deliver sporting activities to young Zambians, helping to improve the quality of their lives and delivering key health messages.

Six weeks soon led to a further four months as Andrew helped to publicise the project before returning to Scotland where he started Africa on the Ball, a non-profit organisation which uses football for social development in deprived communities. “The Zambia project helped me to develop in a personal and professional sense,” added Andrew. “The experience is one that stays with you forever.”

For Hayley, now a physical education teacher back in Scotland, she moved from coaching a girls’ netball team to raising enough funds for a netball court in the heart of the community. She said: “I was in charge of 49 students every day for four months – that prepares you for anything. The experience heightened my interest in education and influences everything I have done since then.”

Hayley Barr pictured with Moses Ndholu (centre) and Laz Kachasa, who work for EduSport in the district of Kalingalinga.

The new netball court is officially opened in Lusaka.
Sport management experts at the University have led a world-first, interdisciplinary research project to raise the profile of Malaysia as a sporting nation on the international stage.

Through partnership with the Malaysian Government, Stirling was contracted to carry out a programme of research into building the capacity of the Malaysian sport industry.

It addressed everything from a review of national sports associations and benchmarking sport's contribution to the economy to reviewing its sports retailing and development of a sponsorship infrastructure.

Professor Leigh Robinson, Director of Research in the School of Sport, led the research team which brought together further experts in retail studies, sport finance and economics. She said: “We were delighted to be given the opportunity to make a positive difference to the Malaysian sport industry. One of the most valuable aspects of the project was the way in which it enabled experts from different disciplines to work together to cover a comprehensive range of issues.

“Now the foundations have been laid to build the capacity of a vibrant and sustainable sports industry in Malaysia, we look forward to seeing progress go from strength-to-strength.”
“My game improved considerably during my time at Stirling and with their support I was able to fulfil my dream of competing at Wimbledon. When I’m not on tour, I still love coming back and training at the University as it has a special atmosphere.”
The generation game

A trio of innovative sports qualifications developed at the University will improve lives within local communities, benefitting everyone from nursery children through to older adults.

There is a qualification training nursery staff to improve children’s fundamental movement skills, another giving pupils CV-building fitness qualifications and one to develop activities for people with dementia.

Sports Participation Officer Nikki Duffy devised the SQA accredited courses in partnership with colleagues across the University. She explained: “The courses are helping people to develop leadership skills, enhance knowledge and improve confidence in the delivery of sport and fitness activities to the wider community.”

Nursery staff and sports coaches at Beaconhurst School in Bridge of Allan were part of a successful pilot project of the Fundamental Movement Skills Award, aimed at children aged four to eight.

School Director of Sport, Judith Ramsay, said: “Taking part in daily physical activity at a young age helps confidence levels and behaviour. It also makes the most of the small window of opportunity when children need to develop the basic skills they will use for the rest of their lives. Working with the University has been an exciting new venture and staff have embarked on the project with real enthusiasm.”

The positive effect regular exercise can have on people with dementia is explored in a dedicated qualification for carers. As well as providing top tips on simple and effective activities of benefit to people with dementia, it also outlines the physiological aspects of ageing and dementia.

“Residents have been much more positive about taking part in the activities and I am now able to point out the physical benefits to them,” said Yvonne Gilchrist, Activity Co-ordinator at Richmond House Residential Care Home in Crieff.

“I don’t have a medical background and it can be worrying that you might do someone more harm than good but now I feel confident I can help our residents stay as active as possible.”
“Now I feel confident I can help our residents stay as active as possible.”

Yvonne Gilchrist, Activities Co-ordinator at Richmond House Residential Care Home

Abronhill High School pupils Demi Mitchell, Scott Smith and Leigh McKeown complete the Young Fitness Leader qualification.

Beaconhurst School staff completed the Fundamental Movement Skills Award for their nursery children.
Next steps

The University has identified a number of important priorities for Scotland’s University for Sporting Excellence:

• Further develop our campus as a world-class gathering place for Scottish sport

• Support high performance athletes and coaches in their pursuit of excellence

• Provide opportunity and employability through education and sport

• Lead on coaching expertise, knowledge and development

• Excel in research which sets the sport and health agenda

• Target economic development through sport

• Use the inspirational power of sport to change lives