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Teaching and learning to enhance retention

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Reflect

Teaching and Learning means to you/your institution

Teaching and Learning

Lectures – remain core teaching method for most undergraduate courses

Tutorials & Seminars

Fieldwork

Laboratory and Practicals

- Problem based learning
- Work based learning
- Independent tasks
- Collaborative projects
- Computer based methods

- Workbooks
- Diaries/portfolios
- Essays
- Posters

Changes in Teaching and Learning

Students value tried and tested methods

Positively want f2f interaction

Technology to support this

Hardy et. al 09

Huge increase in student numbers 40% young people now go to University

Universities developed into multi-million pound businesses – global influence

The direct value of education and training exports to UK economy is £12.5 billion

British Council 2007

Value of international students to UK economy is £8.5 billion

British Council 2007

Think smarter and become more efficient

Engage

Motivate

Retain

Education for the masses!

BEWARE – the business model
– cost effectiveness
Cometh!….

Delivery!

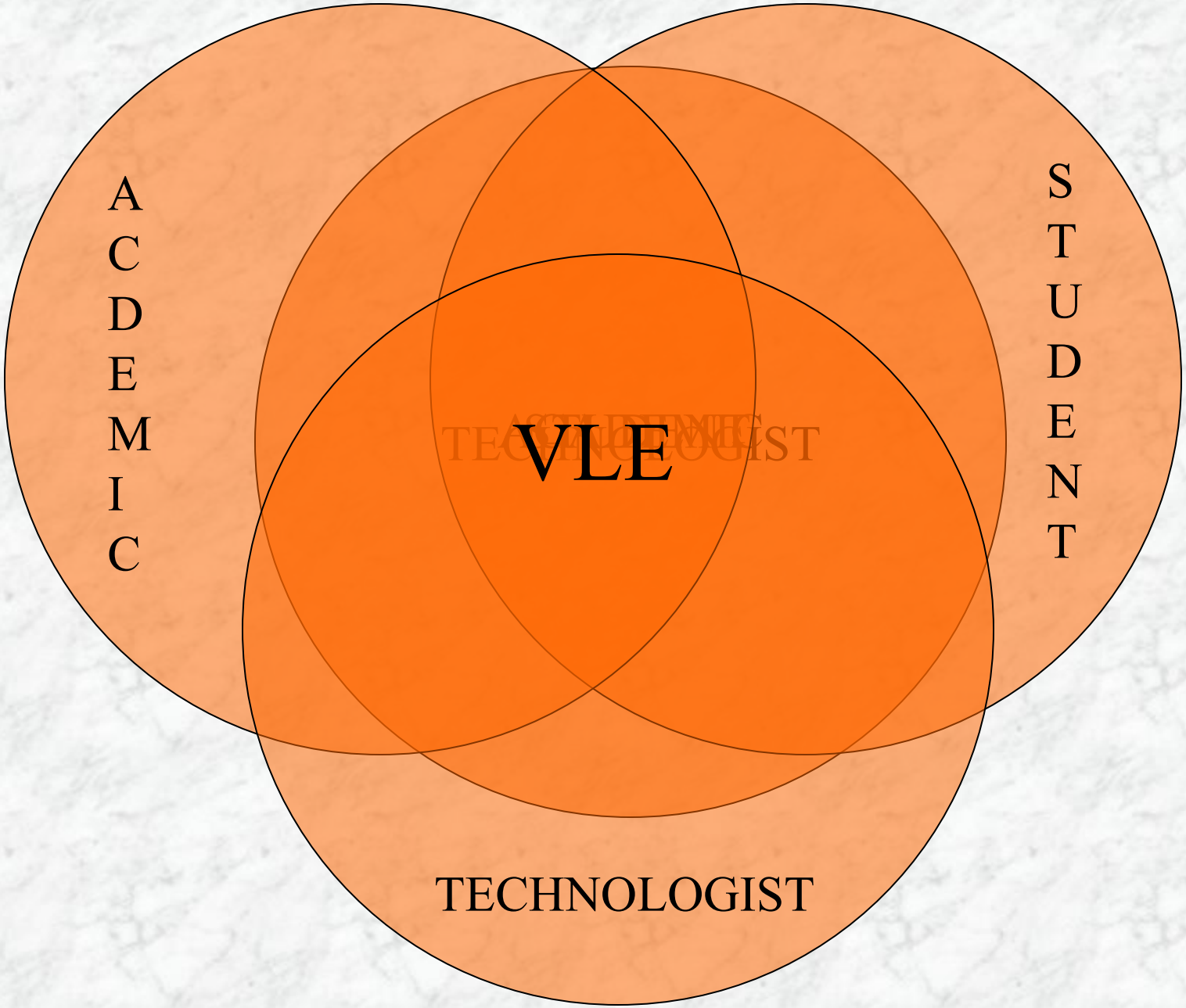
Technology Enhanced Learning

Enhancing the quality of teaching and learning

Primary driver

Student expectation

Improving access to learning for students off campus


ACDEMIC
STUDENT
VLE
TECHNOLOGIST

The ability to deliver flexible learning has never been so great

…but the danger in addressing this is..

the technological tail wagging the pedagogic dog

Technology driving Innovation?

So not only do we need to consider students academic advancement ….

we have to take into account their digital development

DIGITAL LITERACY

BLACKBOARD/MOODLE

Using presentation technology - pdf's/powerpoints/illustrator.
Screencasts
Internet resources into classrooms - Google Earth/USGS.
VLE / MLE – Blackboard.
E-assessments.
Wikis/blogs.
Communications Email – Announcements – Skype.
Online Quizzes.
E-journals - Databases/datasets.
Videos and videocasts.

Typical Lecture material in PDF format

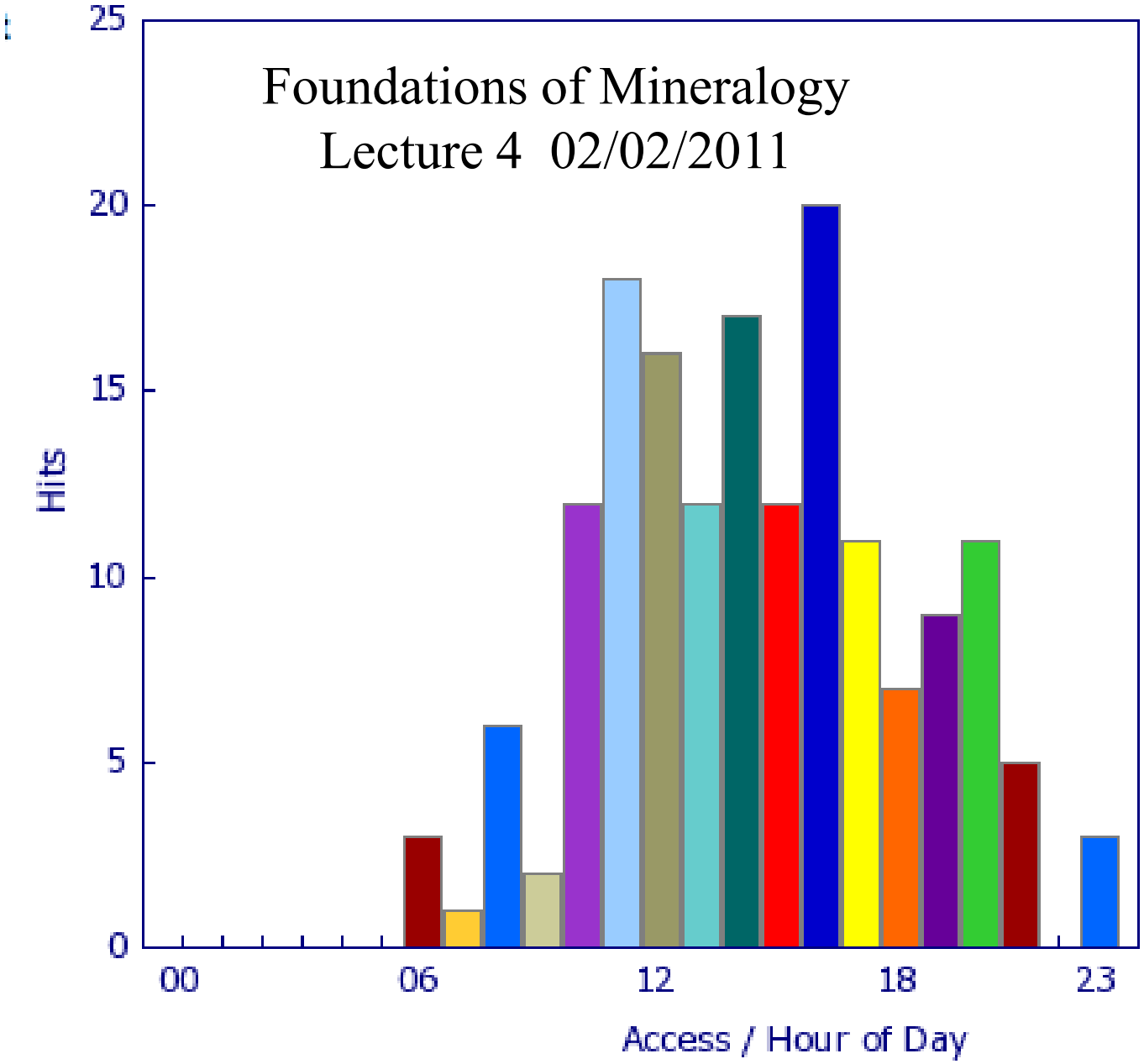
Using live internet resources

Video-casts 1 Compass

Wikis

Powerpoint

Student engagement – where/when do they learn?


Foundations of Mineralogy
Lecture 4 02/02/2011
Hits
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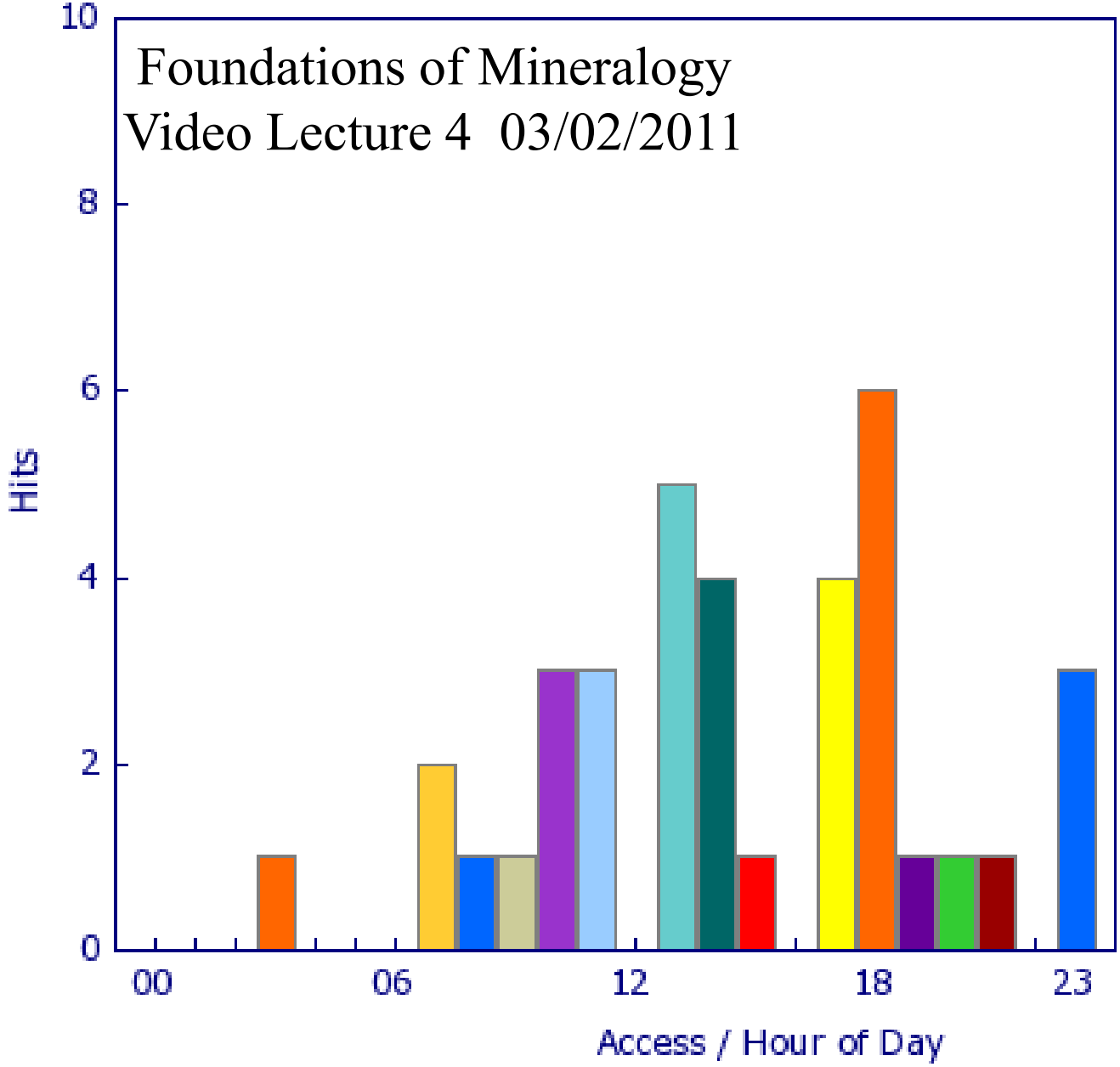
Access / Hour of Day


Foundations of Mineralogy
Video Lecture 4 03/02/2011
Hits
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Access / Hour of Day

How do we measure success of expensive initiatives?

We enrich every students learning environment

We inspire
We motivate
We nurture creativity for successful learning

Monitoring student use of Blackboard

Dashboard

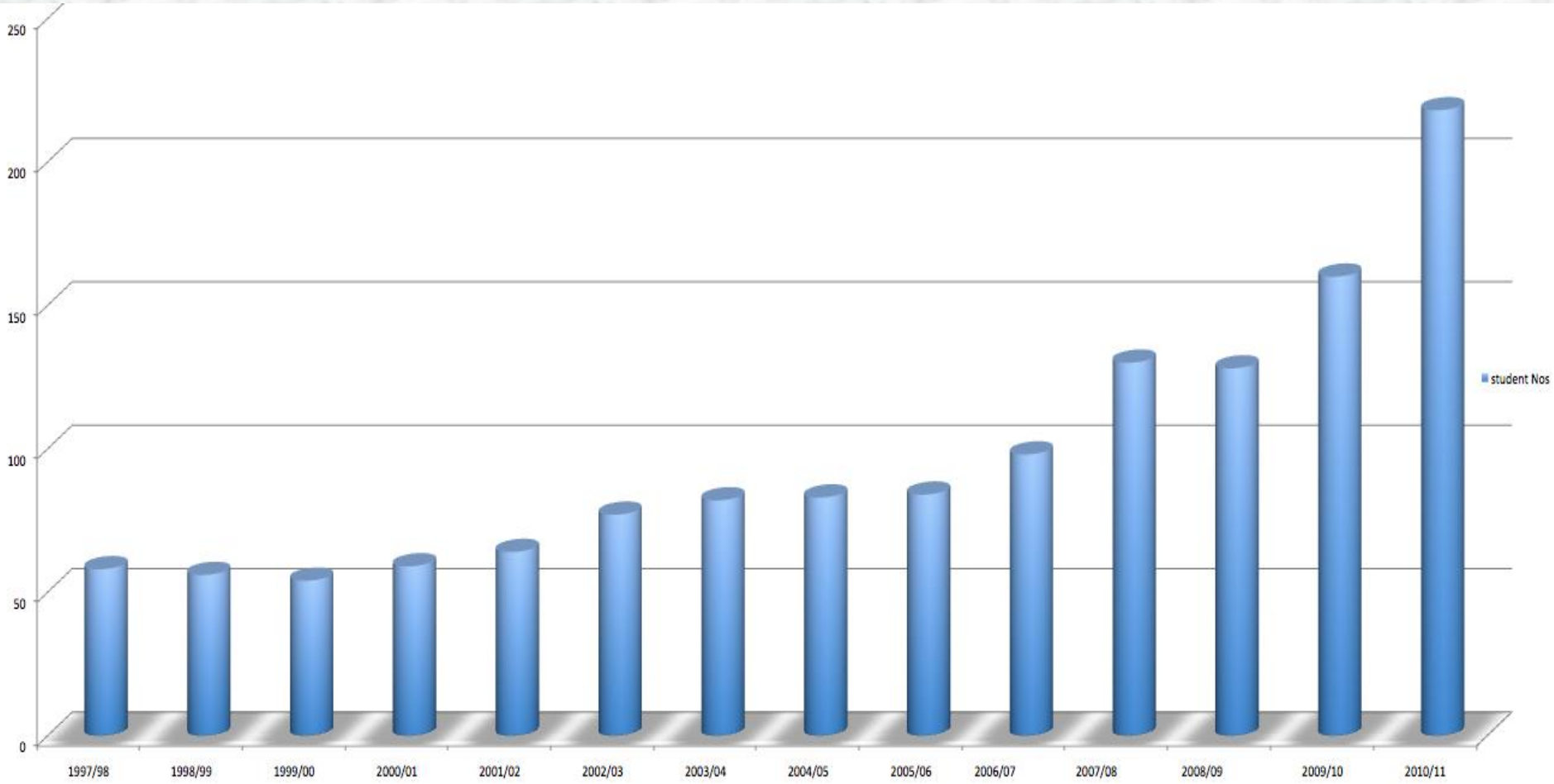
Early warning signs!

Feedback and Retention

Regular Student/Staff exchange committee

Annual ‘Technology Evening’

Questionnaires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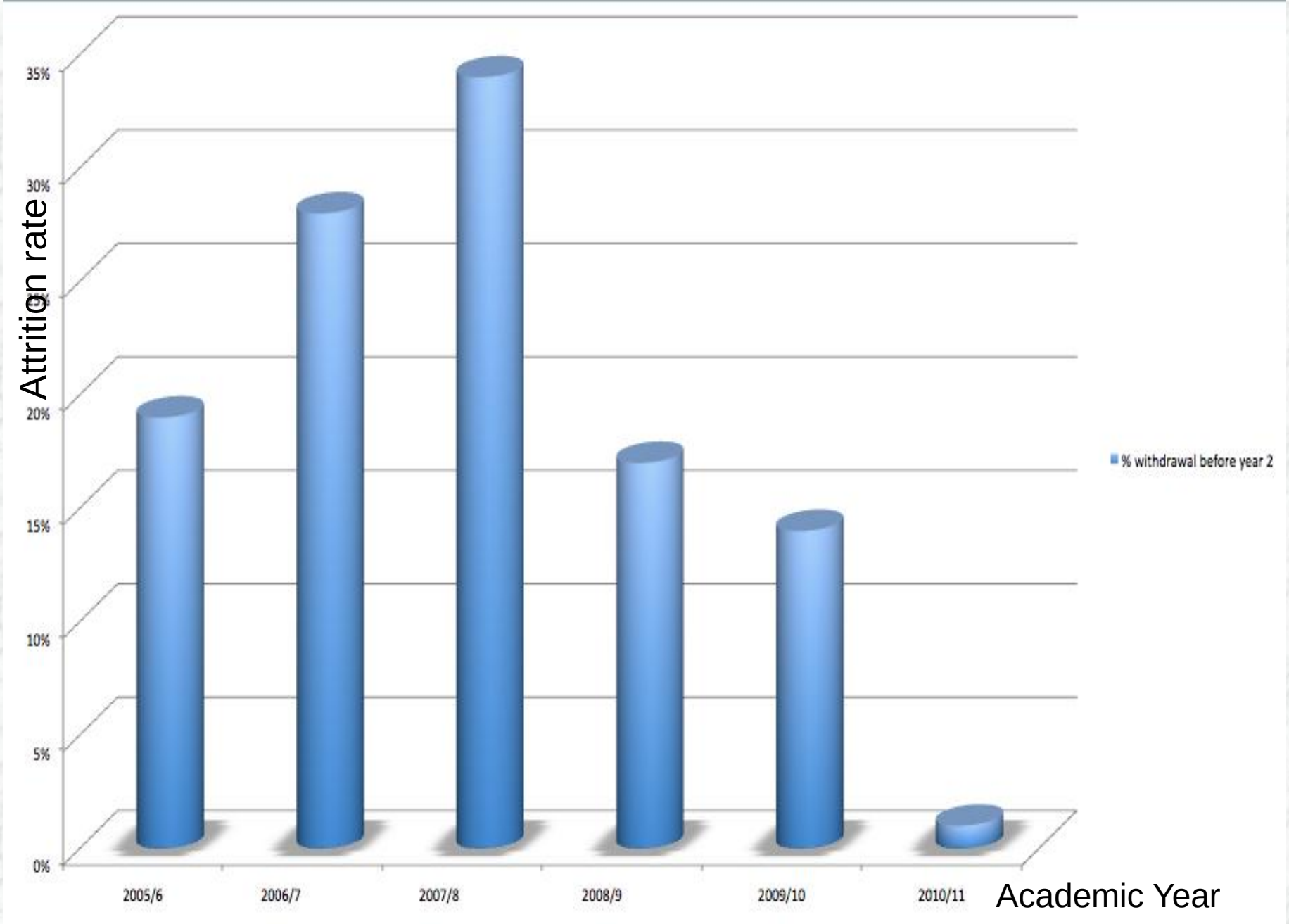
student Nos


Attrition rate
35%
30%
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15%
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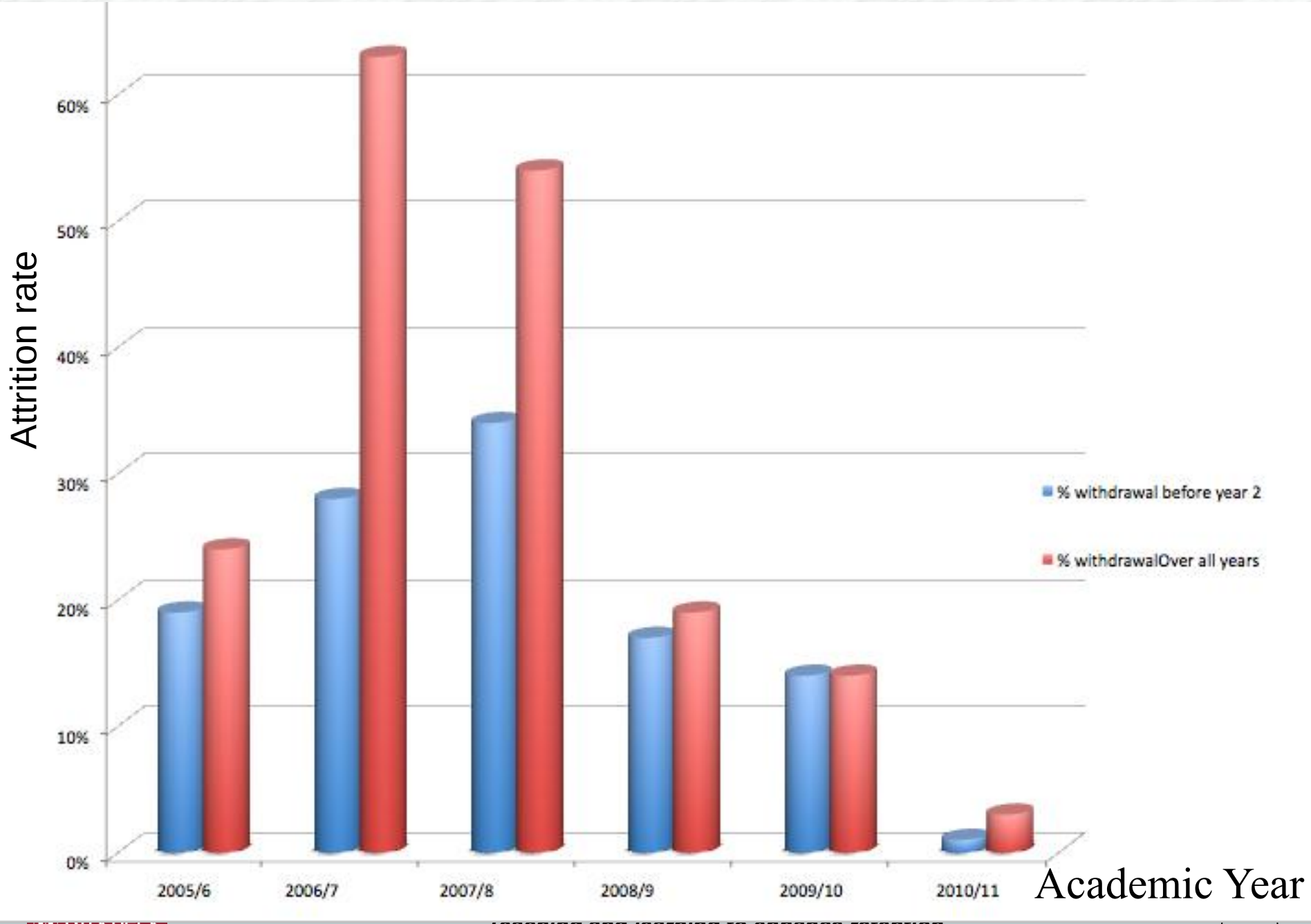
0%
2005/6
2006/7
2007/8
2008/9
2009/10
2010/11
Academic Year
% withdrawal before year 2


Attrition rate
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50%
40%
30%
20%
10%
0%
2005/6
2006/7
2007/8
2008/9
2009/10
2010/11
% withdrawal before year 2
% withdrawalOver all years
Academic Year

Summary

We are not reinventing the wheel but we are using technology to meet our students needs.

We create a safe eLearning environment for students to take intellectual risks.

Cognitive process of learning has fundamentally not changed.

I believe anyone can enrich the learning environment

To quote Diana Laurillard from her professorial lecture

'Begin with an ambition and use technology to achieve it'

The Future

Personalisation – accessibility and flexibility.

Mobile Learning – divorce from traditional bricks and mortar infrastructure – Martini effect.

Interactivity – bring on the games!

‘As each technological innovation has come and gone, it has left education feeling that something good has happened but that nothing fundamental has changed’.

(Noss and Pachler, 1999)

Mobile learning – student expectation

Learners expect to be able to use own devices on university networks

Don’t expect technology to be used as a crutch for poor teaching and learning

Easy access to communicate with peers (Facebook, Twitter and YouTube), with tutors and administrators

Mobile learning

Not the mobility of the technology but the mobility and flexibility of the user

Pinstripe bike docking rage!

Mobile learning

End of 2007

- Apple iPhone launched
- Facebook and Twitter emerging
- YouTube only just launched in UK

- A-Z, death by GPS & Googlemaps?

Mobile learning

April 20th 2011 – iPhone and Galaxy handsets have used the same amount of data it takes to download a million MP3 Tracks everyday.

Phenomonal growth

Devices

Smartphones
Tablets
iPod Touch
iPads
SNS –Facebook
Twitter

Mobile learning

Barriers

- Lack of time
- Lack of money/resource
- Lack of academic staff knowledge