

Student engagement in blended learning: A three year study

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My focus today...



1. What is blended learning?



2. Why should it interest you?



3. What are findings of my study?

http://todaysmeet.com/Riyadh

The screenshot shows a Mozilla Firefox browser window with the following elements:

- Browser Title Bar:** "Alberta » TodaysMeet - Mozilla Firefox"
- Menu Bar:** File, Edit, View, History, Bookmarks, Tools, Help
- Address Bar:** "todaysmeet.com/Alberta"
- Search Bar:** "sum above in word table"
- Bookmarks Bar:** SiriusXM -Login, Google, Tech Eco Ideas, ronowston - Yahoo! ..., Course: GS/EDUC586..., Weather Forecast: N..., Newmarket, Ontario ..., York Atlas - Phone an..., Elsevier Editorial Syst...
- Main Content Area:**
 - Logo:** "TodaysMeet" (with "Today's" in black and "Meet" in red)
 - Listen Section:**
 - Text: "Welcome to my talk. Please post your comments here!"
 - Metadata: "less than a minute ago by Ron"
 - Talk Section:**
 - Red header: "Talk"
 - Text: "Message:"
 - Character count: "140"
 - Input area: A large blue rectangular box for text entry.
 - Submit button: "Say" (in a blue box)


1. So what is blended learning?



SIRA help – what is blended learning?

Answer: ...a formal education program in which a student learns at least in part through online delivery and instruction...

Basic definition...

Proportion of Content Delivered Online	Type of Course	Typical Description
0%	Traditional	Course with no online technology used — content is delivered in writing or orally.
1 to 29%	Web Facilitated	Course which uses web-based technology to facilitate what is essentially a face-to-face course. Uses a course management system (CMS) or web pages to post the syllabus and assignments, for example.
 30 to 79%	Blended/Hybrid	Course that blends online and face-to-face delivery. Substantial proportion of the content is delivered online, typically uses online discussions, and typically has some face-to-face meetings.
80+%	Online	A course where most or all of the content is delivered online. Typically have no face-to-face meetings.

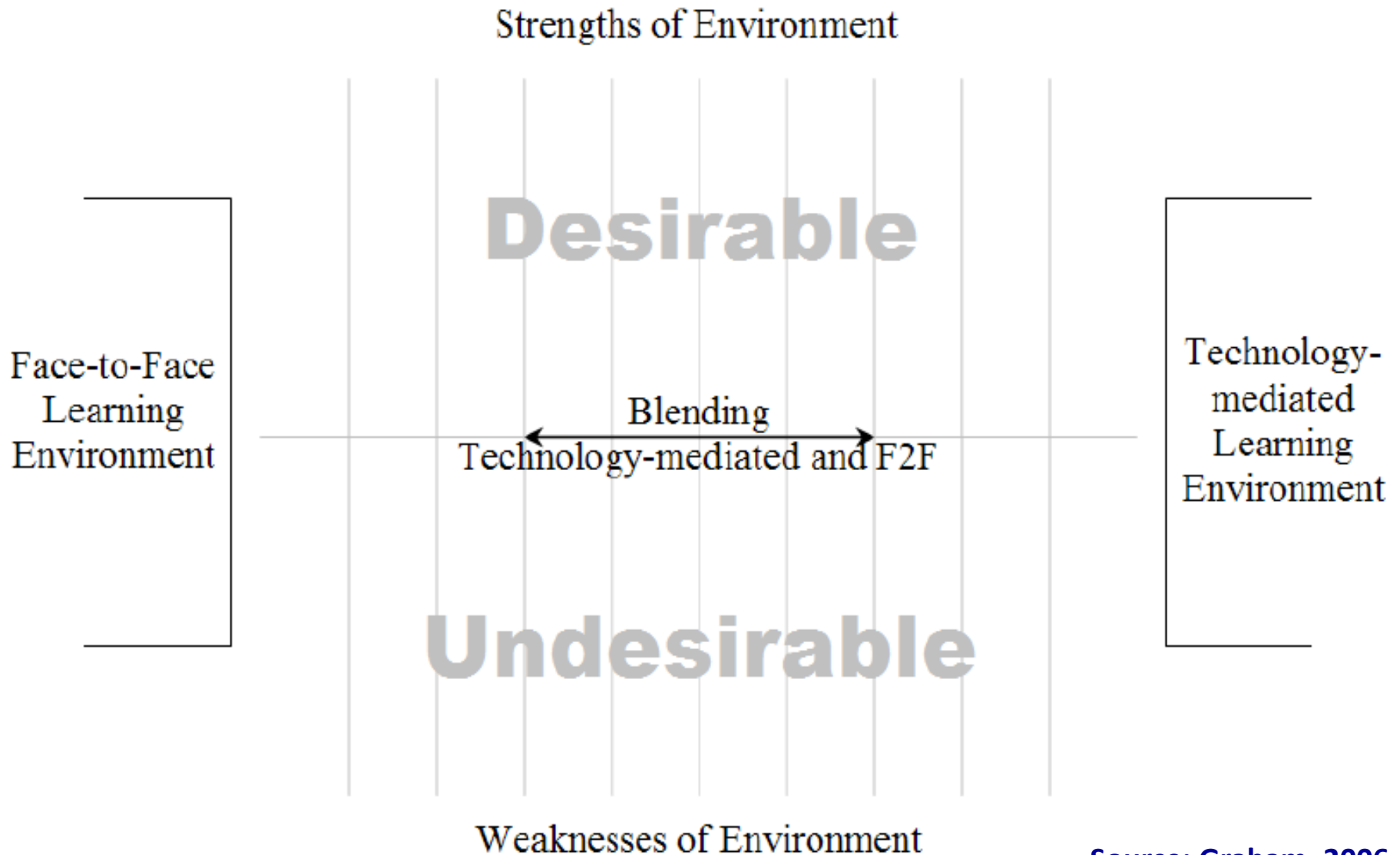
Source: Sloan-C report Blending-In

Another definition...



Blended learning is an approach to course design that brings together the best of both face-to-face and online learning.

Takes best advantage of both worlds



Designing for Blended Learning

Face-to-face

- spontaneous
- ephemeral
- peer influence
- passion
- subjective

Online

- reflective
- permanent
- < intimidating
- reason
- > rigor

**integrate
complement**



2. Why should blended learning interest you?



Student perspective



Faculty perspective



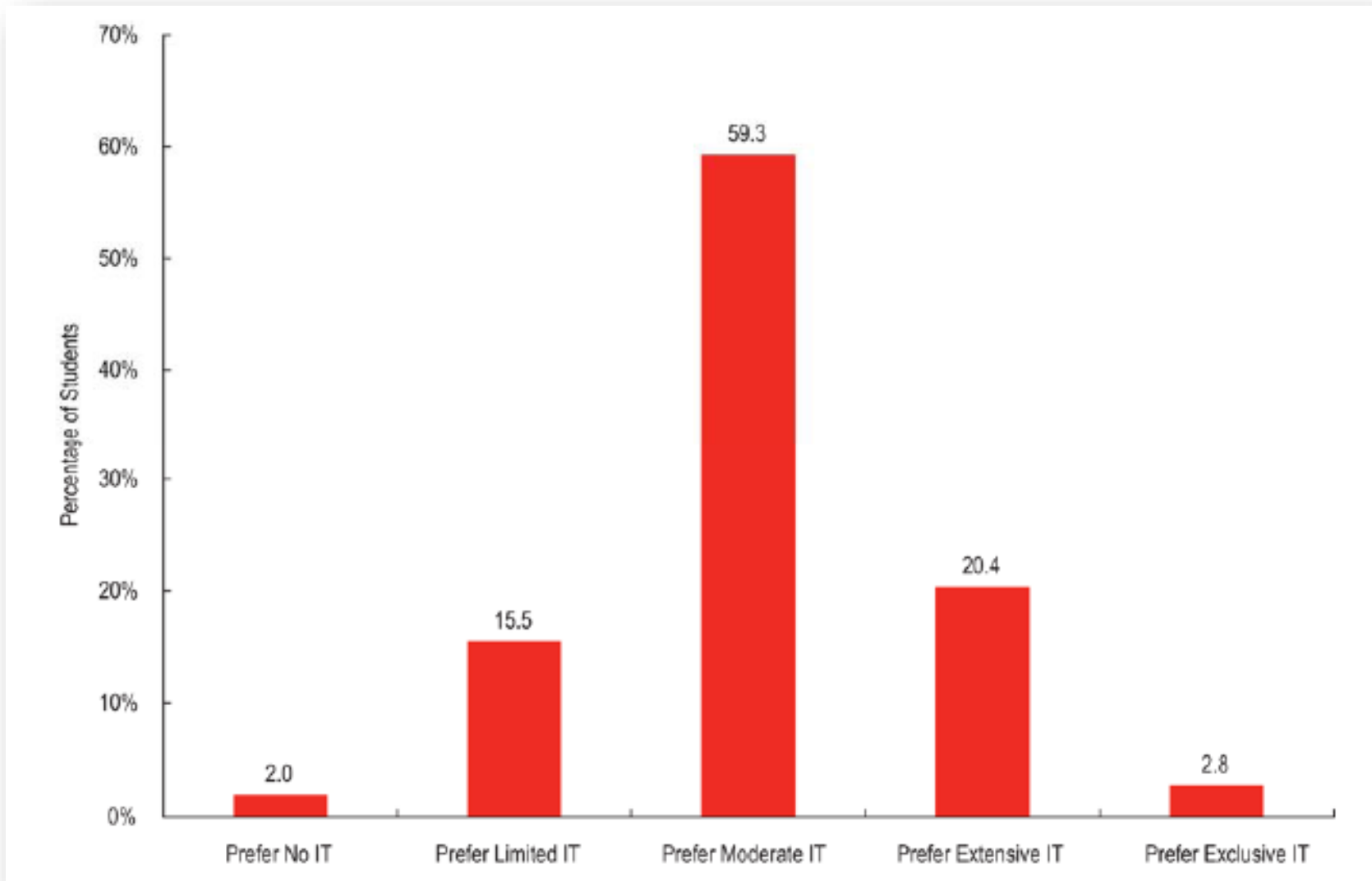
Institutional perspective

Student Perspective: Blended learning clearly improves accessibility

Allows for flexibility in students' study, work, and life balance

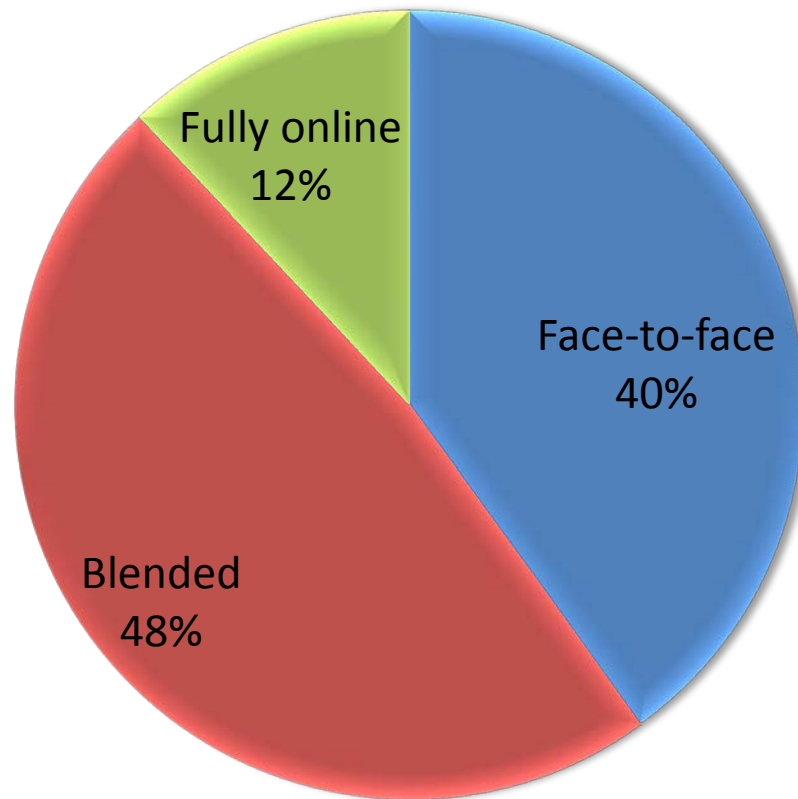


Students don't want "all tech, all the time"



ECAR 2007 survey n= 27,675

Preference for blended course format at York University



N = 2121
34 courses

Students indicated strong satisfaction in my survey of Canadian 8 universities (n=2,714)

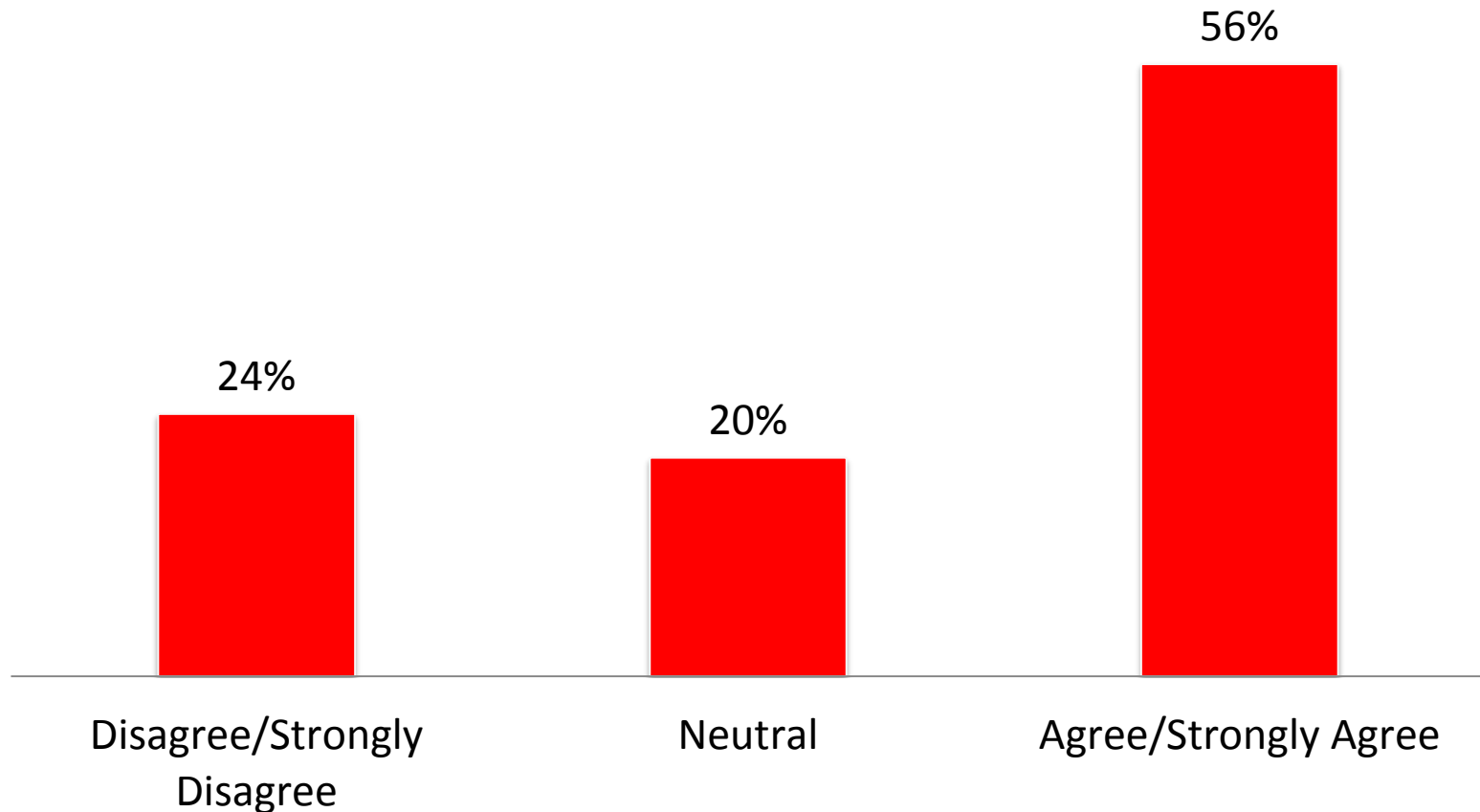
“Overall, I am quite satisfied with this [blended] course” – average 70% (range 65-100%)



COHERE.ca

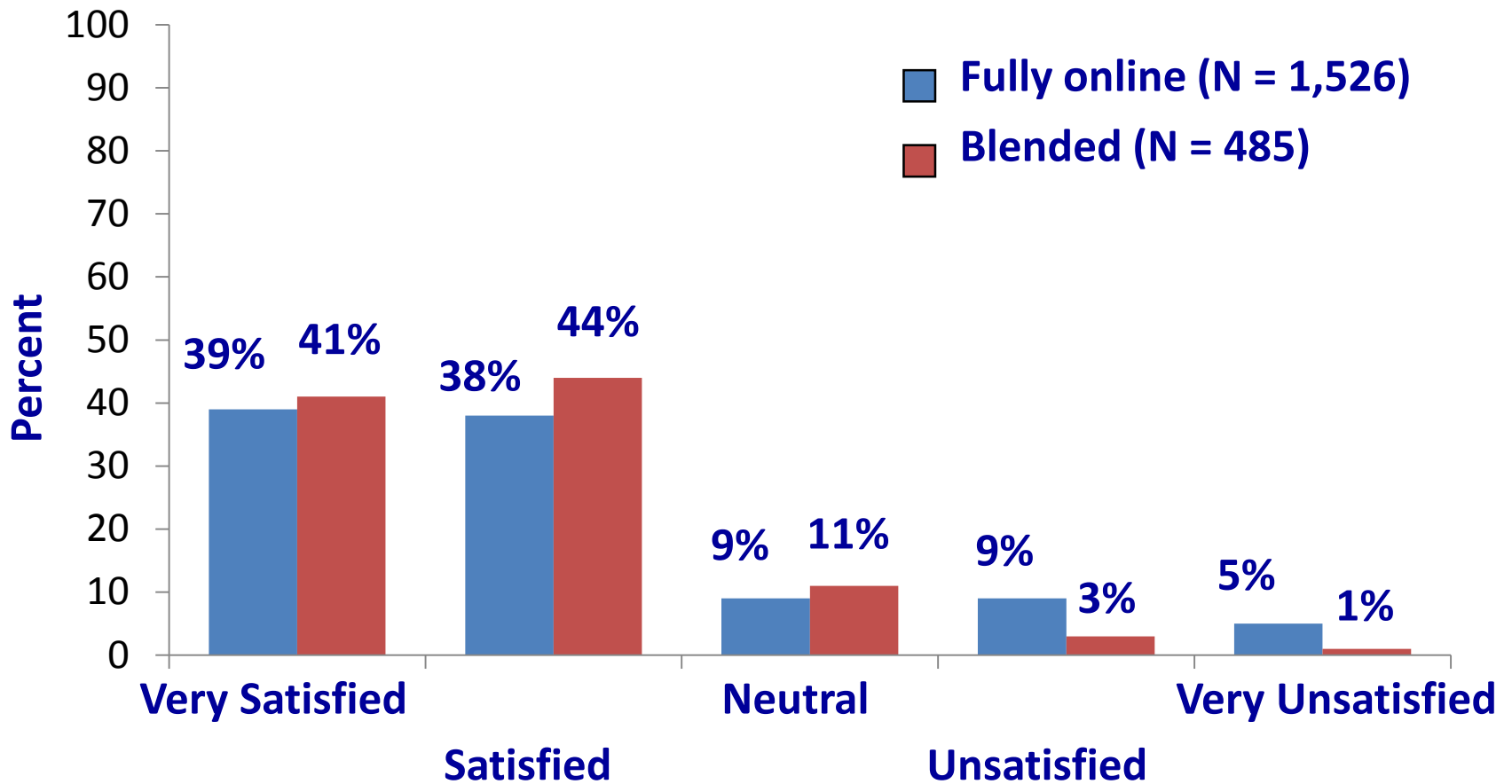
CANADA'S COLLABORATION FOR ONLINE HIGHER EDUCATION AND RESEARCH

I would take another course in the future that has both online and face-to-face components [at York U]



N = 2121
34 courses

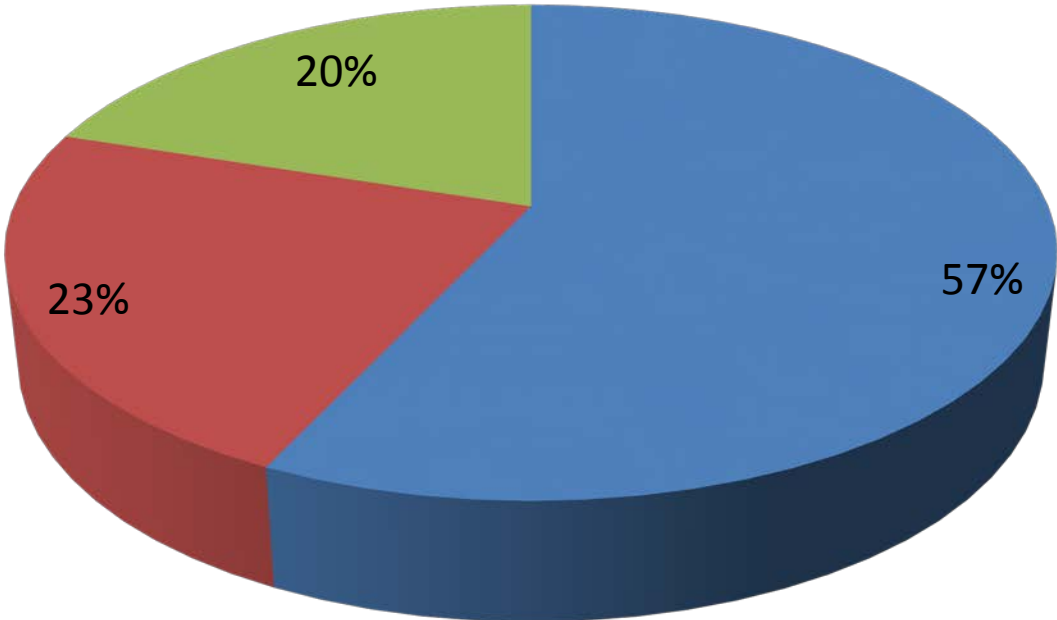
Students more satisfied with blended than fully online courses



Taking this course increased my interest in the material [York U]

%

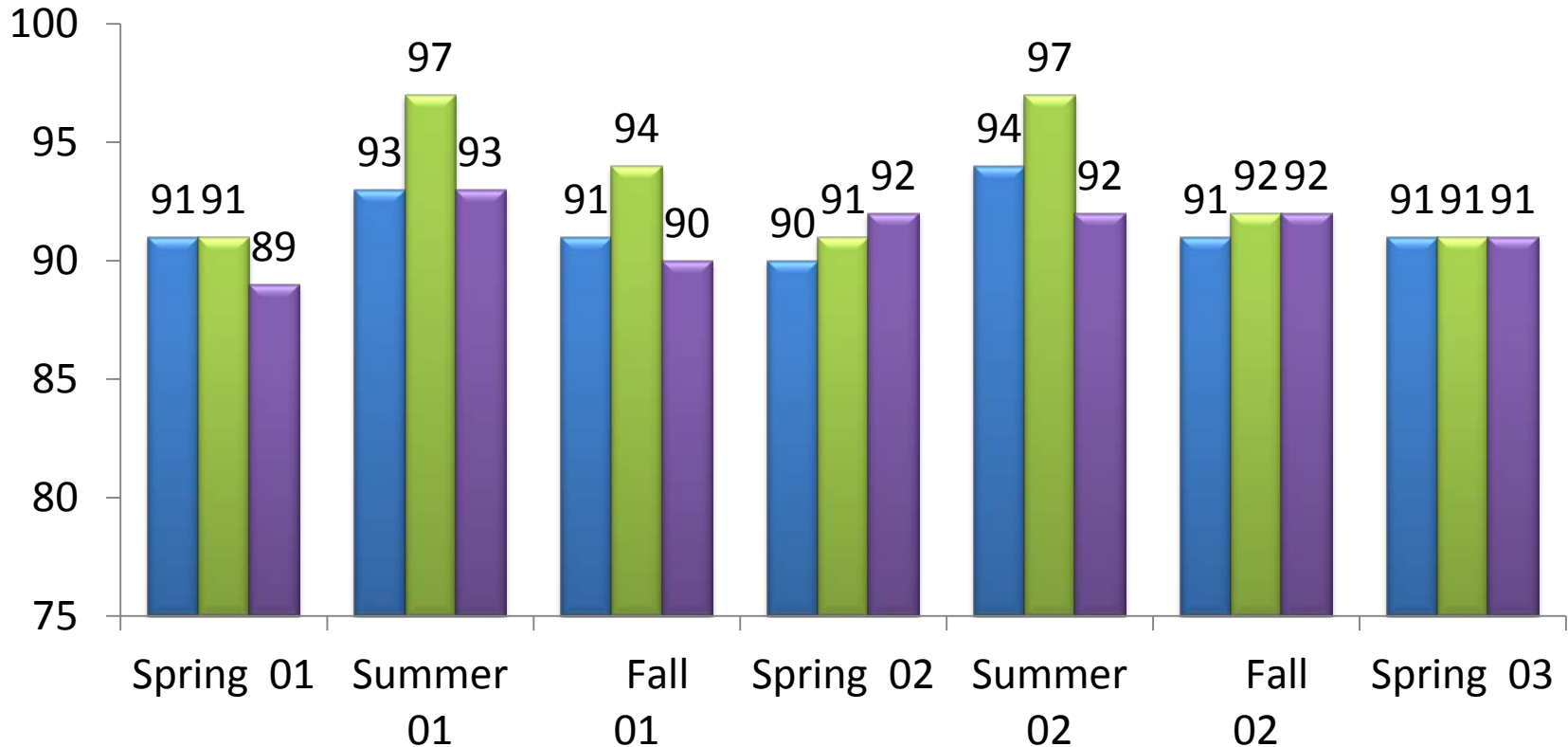
■ Strongly Agree/Agree ■ Neutral ■ Strongly Disagree/Disagree



N = 2121
34 courses

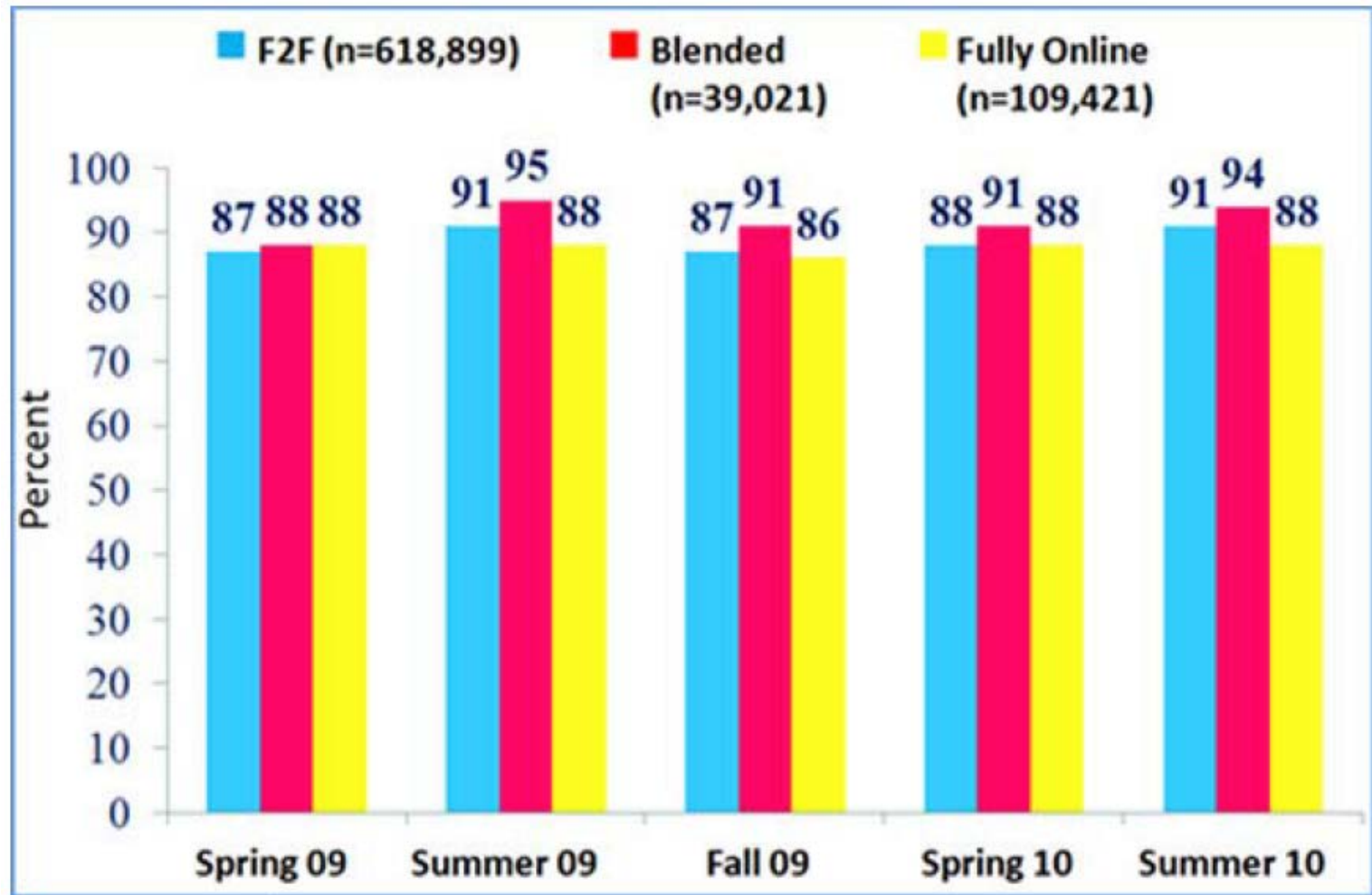
BUT, what about improving learning?

Blue = F2F
Green = Blended
Purple = Online



% getting grades above C (N= 139,444 students)
Dziuban & Moskal, Univ. of Central Florida (n.d.)

Same pattern continues at UCF...



Further evidence...



“Students who took all or part of their class online performed better, on average, than those taking the same course through traditional face-to-face instruction.”

(51 studies, effect size = +0.24)

A student's perspective...



A student's perspective...



- **Instant feedback**
- **Shared understanding of content**
- **Flexible**
- **Online flowed into classroom**
- **Any time, anywhere**

Challenges for students



- **Transition – from a passive to an active learning approach**
- **Study and time management skills, esp. low achievers**
- **Expecting that fewer classes equates to less work**
- **Accepting responsibility for completing individual & team activities**

Faculty perspective on blended...

High satisfaction

**Get to know
students better**



**Adds flexibility to
your schedule**

Reinvigorates teaching

Challenges for faculty



- **Workload/tenure issues**
- **Resistance to change-why bother?**
- **Time consuming initially**
- **Managing with scarce support for course redesign**
- **Learning to use new technologies**

Institutional perspective...cost avoidance

Online and blended courses allowed UCF to avoid more than \$7 million in construction costs \$277,000 in annual operating costs (Hartman, 2007)



Our calculations show that 100 new courses will yield about \$12 million in income and cost \$1.5 million → ROI 8:1 (<http://irlt.yorku.ca>)

Improved classroom utilization

	MON	WED	FRI
Traditional Scheduling	PLS 828	PLS 828	PLS 828
Blended Scheduling	PLS 828	ENG 341	COM 200

(Hartman, 2007)

Challenges for the institution



- **Is blended learning consistent with vision?**
- **Is there an action plan?**
- **Incentives in place?**
- **Academic recognition in place?**
- **Is it sustainable?**

3. What are findings of my 3 year study?

- 5 large (~300/students) first year Fine Arts courses surveyed, N=2094
- Asked for perceptions compared to other courses they've taken
- Scale 1 to 5 (SD, D, N, A, SA)







Findings for student involvement: as compared to other courses taken

Survey Questions	Year I	Year II	Year III	
Q4 (online and F2F components enhanced each other)	2.93	3.00	3.12	↑
Q7 (clearly communicated expectations)	n/a	3.39	3.69	↑
Q11 (more engaged)	2.55	2.56	2.81	↑
Q12 (likely to ask questions more)	2.60	2.56	2.68	↑



Findings for student interactions in course

Survey Questions	Year I	Year II	Year III
Q13 (increased <u>amount</u> of interaction among <u>students</u>)	2.34	2.57	2.53 
Q14 (better <u>quality</u> of interaction among <u>students</u>)	2.33	2.59	2.64 
Q16 (increased <u>amount</u> of interaction with <u>instructor</u>)	2.37	2.46	2.49 
Q17 (better <u>quality</u> of interaction with <u>instructor</u>)	2.56	2.53	2.63 



Findings for technology use

Survey Questions	Year I	Year II	Year III
Q5 (easy to find course information on Moodle)	3.46	3.68	3.91
Q6 (Moodle resources were useful)	3.32	3.62	3.75
Q8 (technology for online activities was reliable)	n/a	3.35	3.64
Q23 (technology interfered with learning)	2.18	2.60	2.54



Findings on student learning

Survey Questions	Year I	Year II	Year III
Q2 (increased interest in subject)	n/a	3.16	3.28 ↑
Q20 (improved understanding of concepts)	2.99	3.21	3.35 ↑
Q21 (developed better communication skills)	n/a	2.60	2.76 ↑
Q22 (more opportunities to reflect)	n/a	2.89	3.11 ↑



In summary...

Blended learning can lead to greater student learning and engagement

BUT

The instructor role is critical

Are you willing to try blended learning?



Questions/comments?

Follow up ...

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