

# **A Fast Track to Improving Retention and Student Assessment Data:**

## **Using Traditional Recruitment Systems to Increase Student Re-enrollment Rates**

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[www.mst.edu](http://www.mst.edu)

# Admissions' Multi-Media Resources

- Direct Mail
- E-Mail or CRM
- Internet/Websites
- Social Networking Sites: MySpace or Facebook
- Phone Calling or Telecounseling

# The Price of Retention Success

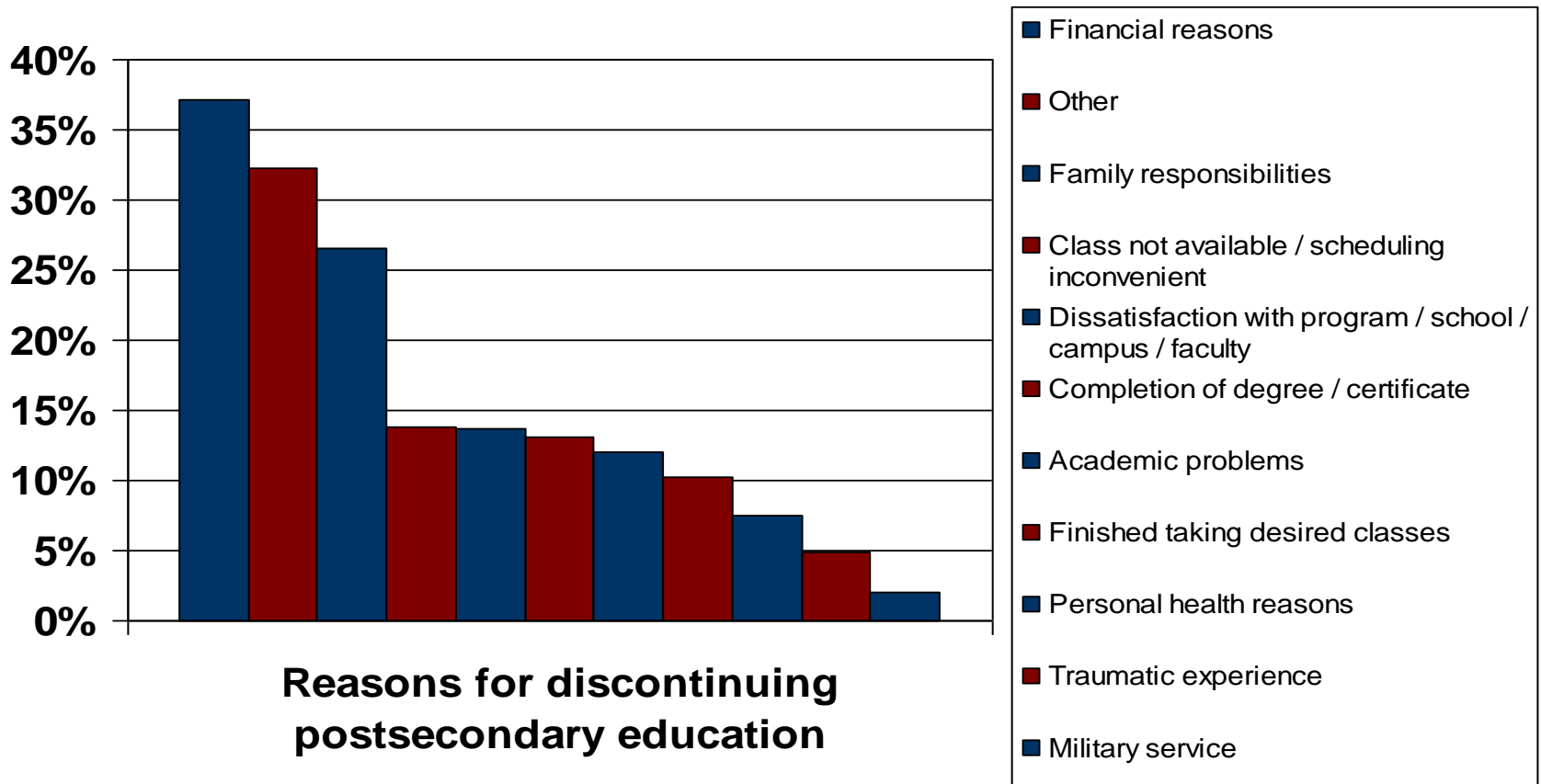
- 3% (25-35 students) gain from multi-media outreach
- First year: \$162,500 to \$227,500 USD
- Fourth year: \$650,000 to \$910,000 USD

# Cohorts to Focus On

## Student Groups Unfamiliar with Financial Aid Processes

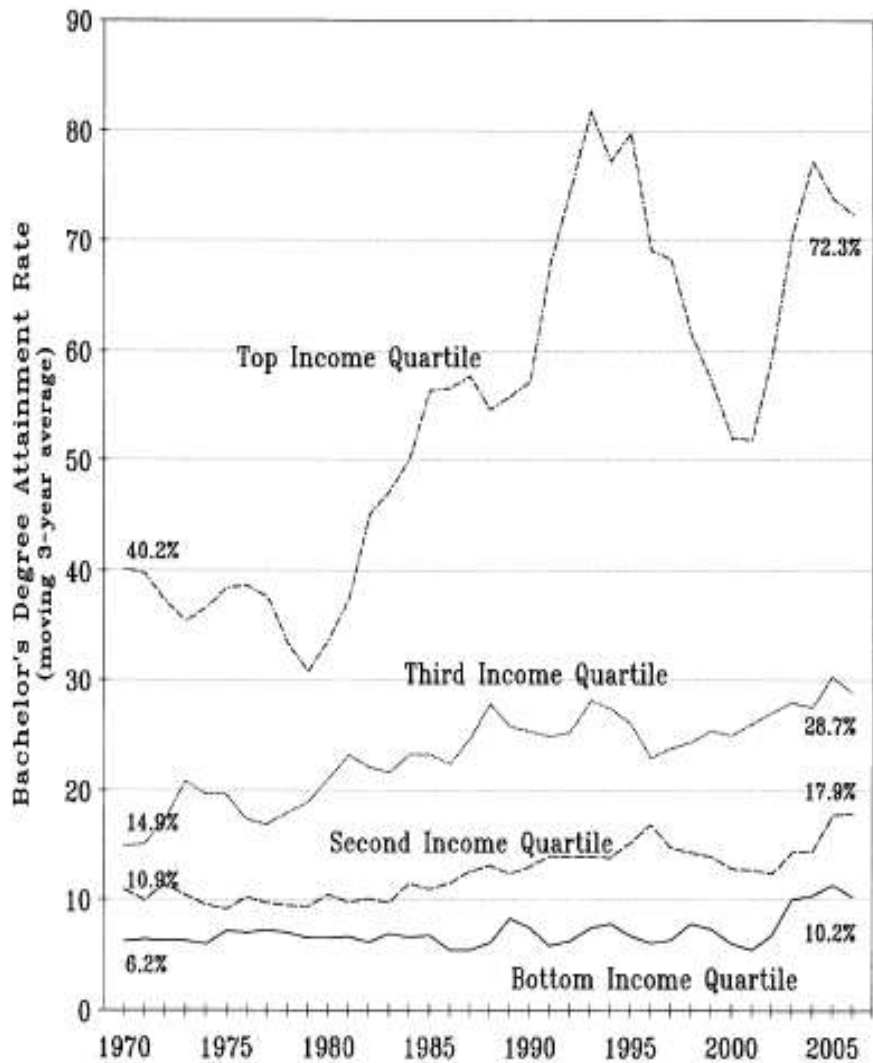
- Students dropped for non-payment
  - » 2002: +400, 2007: 48
  - » 1-3% instant gain in retention
  - » \$128,000 additional net tuition revenue
- Minority and First-Gen Students
- Student working more than 30 hours per week
- STEM Majors

# Financial considerations the most common reason for leaving college

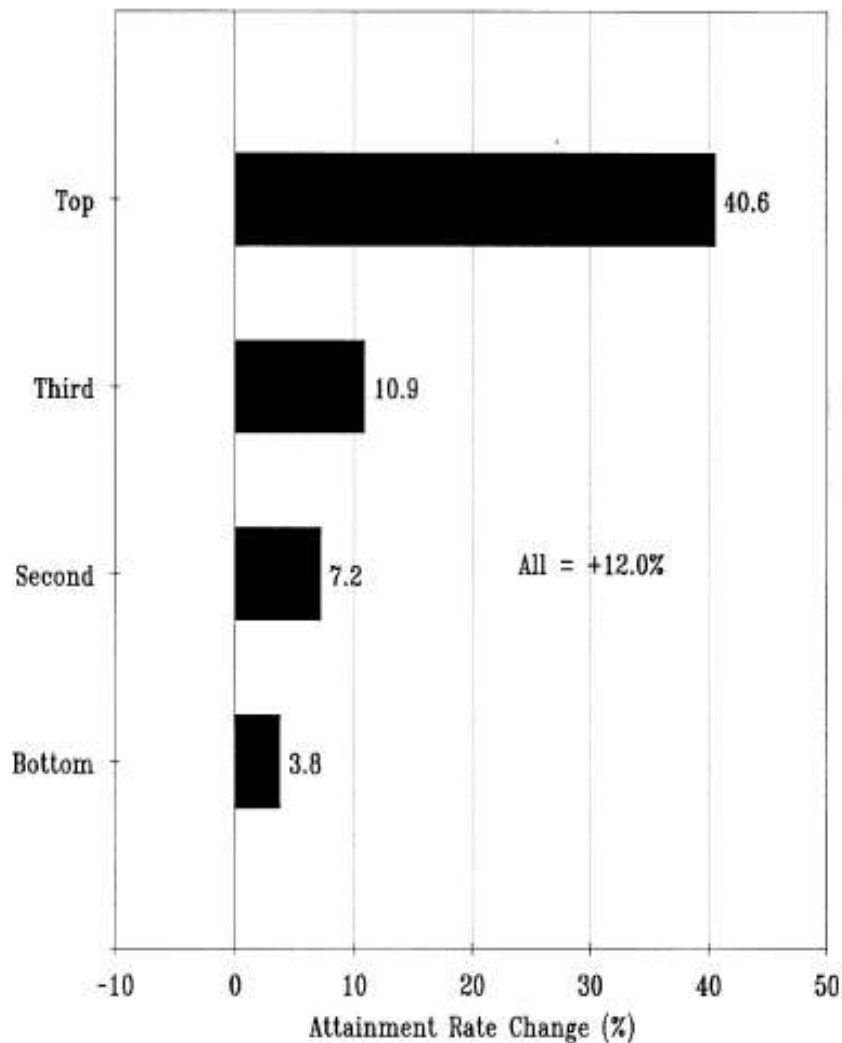


SOURCE: ELS:2002 "A First Look at the Initial Postsecondary Experiences of the High School Sophomore Class of 2002 (National Center for Education Statistics)

Estimated Baccalaureate Degree Attainment  
by Age 24 by Family Income Quartile  
1970 to 2006



Change in Estimated Bachelor's Degree Attainment Rate  
by Age 24 by Family Income Quartile  
1977-79 to 2004-06



# FUNDAMENTAL STUDENT RETENTION CONCLUSIONS

1. Studies indicate that **financial aid helps increase persistence** for students who need and receive financial aid.
2. Studies indicate that certain student populations such as:
  - older students,
  - African Americans & Hispanics,
  - students who **work more than 30 hours** weekly, and
  - **first generation** college students have persistence problems.
3. Schools can improve retention rates by:
  - accurately **determining when and why students withdraw**
  - Up-to-date information helps administrators determine better strategies for increasing retention rates

# **Calling Students is the Most Effective Intervention**

# The landline is still a lifeline for teen social life.

- Those ages 12-17, phone conversations and face-to-face meetings are the most frequently chosen ways to communicate with friends outside of school.
- Multi-channel teens – those teens who use the internet, instant messaging, text messaging a cell phone, *and* social networking sites – are **more likely to turn to cell phones and digital media when communicating with friends.** These multi-channel teens are super communicators who will use any tool at their disposal, but cell phones, instant messaging applications, and social networking channels rank higher in the panoply of their communications choices when compared with landline and face-to-face communication outside of school.

SOURCE: Teens and Technology, Pew Internet & American Life Project Summary of Findings

## Rank Order of Teen Daily Social Communications Choices

*The most popular methods of communicating with friends every day*

Rank	All Teens (n=935)	Cell-using teens (n=618)	Internet-using teens (n=886)	Teens who use the internet and have cell phones (n=601)	Teens who use social network sites (n=493)
1	Landline	Cell phone	Landline	Cell phone	Cell phone
2	Cell Phone	Landline	Cell phone	Landline	Landline
3	Face to face	Text	Face to face	Text	IM
4	IM	IM	IM	IM	SNS
5	Text	Face to face	Text	Face to face	Face to face
6	SNS	SNS	SNS	SNS	Text
7	Email	Email	Email	Email	Email

Source: Pew Internet & American Life Project Survey of Parents and Teens, October-November 2006. Margin of error for teens is  $\pm 4\%$ .

# A Lot of Talking Going On

## Multi-Channel Teens Are Super Communicators

*The percent of teens who communicate with their friends every day via these methods...*

	All teens (n=935)	Multi-channel teens+ (n=265)
Talk to friends on landline telephone	39%	46%
Talk on cell phone	35	70*
Spend time with friends in person	31	35
Instant message	28	54*
Send texts	27	60*
Send messages over social network sites	21	47*
Send email	14	22

*Source: Pew Internet & American Life Project Survey of Teens and Parents, October-November 2006. n=935. Margin of error for teens is  $\pm 4\%$ . +Multi channel teens are defined as teens who use the internet, have cell phones, use instant messaging, text messaging and use social network sites. \* indicates statistically significant differences between the percentages in the row.*

# **Use Existing Communication Services**

# Direct Mail

- Re-designing the bills to be easier to read: use a credit card model and provide on-line access
- Re-write Academic Warning Letters
- Postcards for Families: Important Dates, Parents' Association, etc.

# E-mail

- Send students information you know they need, but NOT TOO OFTEN
- Do not send more than one e-mail every three to four weeks.

# **Success Chain: Focusing Student Support Programs on the Students Most Likely to Need Them**



# SUCCESS CHAIN

Online  
Resources:

- › [Career Opportunities Center](#)
- › [Office of Undergraduate Studies](#)
- › [Counseling Center](#)
- › [Writing Center](#)

**Important Dates**

Mid Semester Grades Available  
Monday, Oct 22, 2007

Advising Week for Spring  
Semester 2008  
Mon-Fri, Oct 22-26, 2007

JoeSS Online Registration for  
Spring Semester  
Monday, Oct 29, 2007

Last Day to Drop a Course  
without a Withdraw  
Tuesday, Oct 2, 2007

Last Day to Drop a Course  
Friday, Nov 9, 2007

Last class Day  
Friday, Dec 7, 2007

Final Exams  
Dec 10-15, 2007

Grades Available via JoeSS  
Tuesday, Dec 25, 2007

Dear Brad,

**Once again, welcome to Missouri S&T! I hope you had an enjoyable and productive Opening Week.**

Since 2001, Missouri S&T has added over 28 various student support programs and assessments. These efforts have generated record student success and retention levels, but our goal is to make sure every new student has the support to earn a Rolla degree.

As part of Missouri S&T's desire to help our students be successful at the university, we will be contacting you periodically throughout the semester to offer information on topics that our previous students have found most beneficial in guiding them through their first semester.

Below are samples of the information topics that Success Chain will supply. Please click on the topics if you are currently seeking additional information in that area.

- [Study Skills](#)
- [Time Management](#)
- [Getting Involved on Campus](#)
- [Living w/Roommates](#)
- [Working w/Instructors & Academic Support](#)
- [Advising: How to get the most from your advising experience](#)
- [The Academic Alert System](#)
- [Finding Resources in the Rolla Community](#)
- [Health and Wellness](#)
- [Financial and Credit Card Management](#)
- [Preparing for Exams](#)

We also use the Success Chain for new students to provide direct feedback on issues and services. You will receive a few online surveys throughout the semester. We very much appreciate your insights and feedback.

If you have immediate questions or would like to learn more about the variety of student support programs on our campus, please contact the Office of Undergraduate Studies at 341-7276 or email [ugs@mst.edu](mailto:ugs@mst.edu).

Best regards for a productive and healthy semester.

Dr. Harvest L. Collier

# Success Chain

Week #	Topic	Strength	Weakness		
1 (Orientation)	Welcome				
2 (Class Starts)	Study Skills/Time Management		Low Prudence	High Sociability	
3					
4	Getting involved on Campus	High Sociability	Low Adjustment		
5					
6	Living w/ Roommate	High Sociability	Low Adjustment		
7					
8	Working w/ Instructors and Tutoring		Low Prudence	High Sociability	Low Adjustment
9 (Midterm)					
10	Working w/ Advisor and Class Scheduling		Low Prudence	High Sociability	Low Adjustment
11 (advising week)					
12	Entertainment in Rolla	High Sociability	Low Adjustment		
13					
14 (Last Day to drop)	Health and Wellness		Low Adjustment		
15					
16	Financial Management		Low Adjustment	Low Prudence	
17					
18 (Finals)	End of Semester Recap and encouragement				

Low Prudence

Low Adjustment

High Sociability

I do not do my job as well as I can

I am often tense or anxious

I would go to a party everynight I could

I do things on impulse

I am not calm in a crisis

I like a lot of variety in my life

# Internet – Homepages – Social Networks

- Create a Centralized Help Page for Students and Parents (Good Orientation Project!!)
- Make sure your search engine is geared to identify key webpages based on the student's need (i.e. scholarships, financial aid, tutoring, suicide, depression, I need help, etc.)
- **Make sure that all student service pages include the names and contact info for the staff and faculty! -It is AMAZING how many do not!!**

# Social Networks

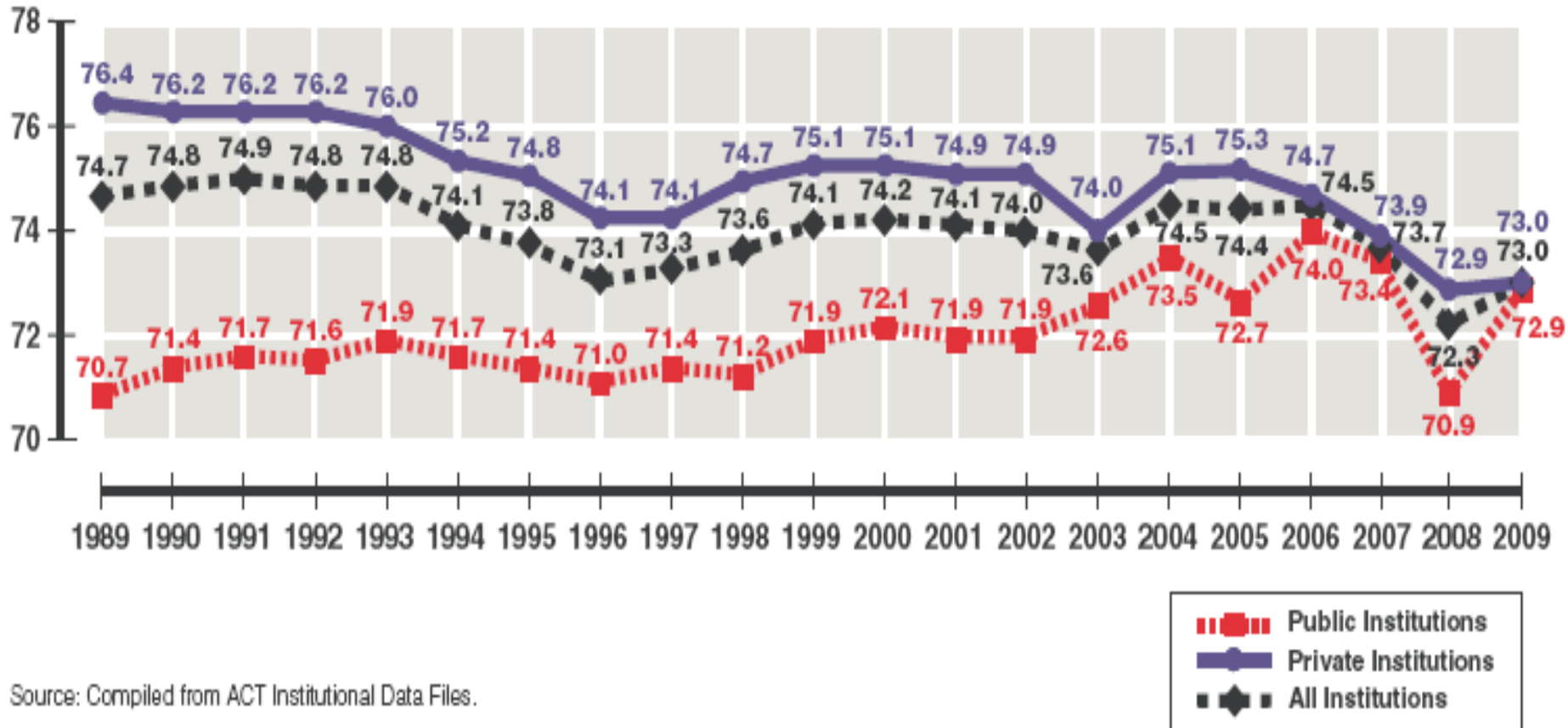
(Facebook, MySpace, Friendster, etc.)

- E-Birthday Cards – **Everyone likes it!**
- Identify students interests
- Promote events and services

# **BENCHMARKS**

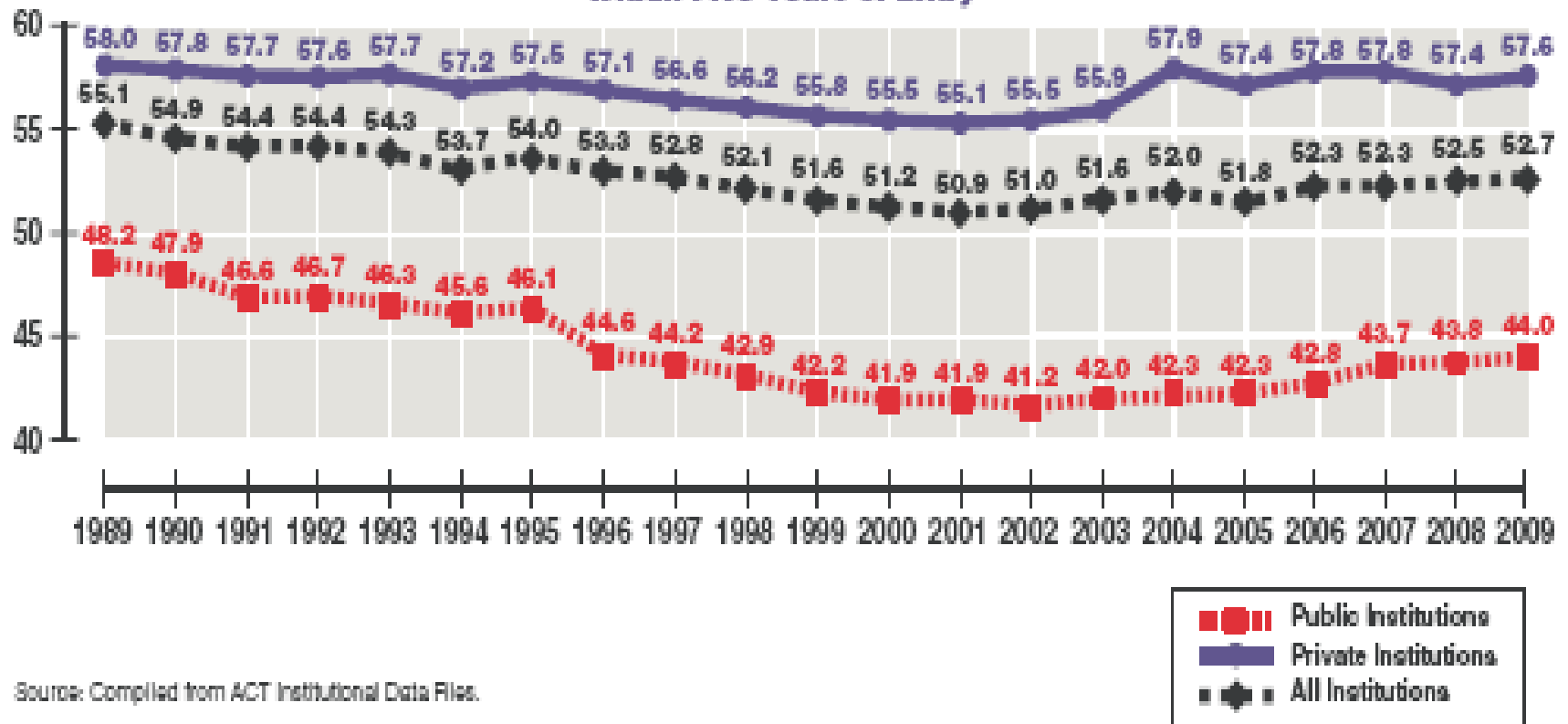
# Student Success Trends

Percentage of First-Year Students at Four-Year Colleges Who Return for Second Year



SOURCE: [www.act.org](http://www.act.org). 2009 report

### Percentage of Four-Year College Students Who Earn a Degree Within Five Years of Entry



Source: Compiled from ACT Institutional Data Files.

SOURCE: [www.act.org](http://www.act.org). 2009 report

# Retention Trends

## Freshman to Sophomore Year

1983–2009

	Highest %	Lowest %	Current %
Two-year public	53.7 ('08)	51.3 ('04)	53.7
BA/BS public	70.0 ('04)	66.4 ('96, '05)	67.6
MA public	71.6 ('06)	68.1 ('89)	69.8
PhD public	78.1 ('04)	72.9 ('08)	74.4
Two-year private	72.6 ('92)	55.5 ('08, '09)	55.5
BA/BS private	74.0 ('89)	69.6 ('08)	69.9
MA private	78.0 ('85)	72.3 ('08)	72.0
PhD private	85.0 ('85)	80.4 ('08)	80.6
National	68.7 ('07)	65.7 ('08)	65.9

SOURCE: [www.act.org](http://www.act.org)

# Completion Rates\*

1983–2009

## Two-Year Colleges

	Highest %	Lowest %	Current %
Public	38.8 ('89)	27.1 ('07)	28.3
Private	66.4 ('90)	50.2 ('08)	51.6
All	44.0 ('89)	28.9 ('07)	30.8

\* Completion of associate's degree in 3 years or less

SOURCE: [www.act.org](http://www.act.org)

# Completion Rates\*

1983–2009

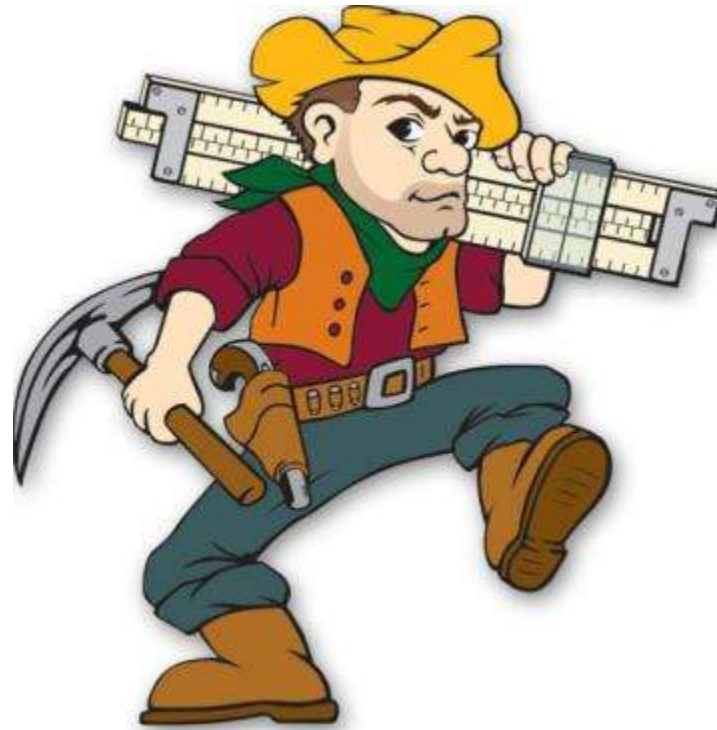
## Four-Year Colleges

	Highest %	Lowest %	Current %
BA/BS public	52.8 ('86)	39.6 ('06)	43.0
MA/MS public	46.7 ('86)	37.0 ('00)	38.4
PhD public	50.6 ('89, '90)	45.0 ('01)	48.7
BA/BS private	57.5 ('06)	53.3 ('01)	55.9
MA/MS private	58.4 ('88)	53.5 ('01)	54.8
PhD private	68.8 ('86)	63.1 ('05)	65.1
National	54.6 ('90)	50.9 ('01)	52.6

\* Completion of bachelor's degree in 5 years or less

SOURCE: [www.act.org](http://www.act.org)

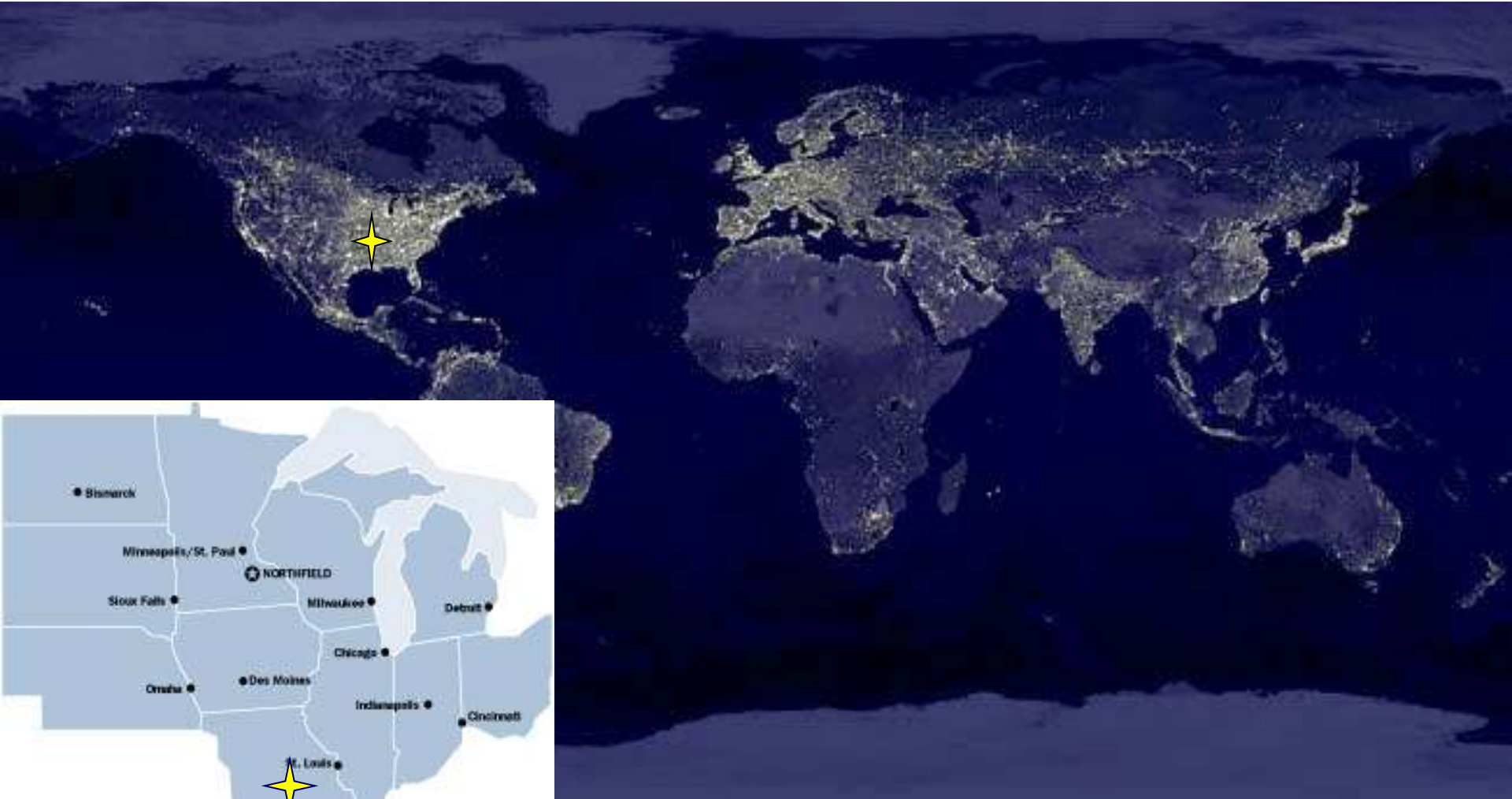
# National Academic and Outcomes Rankings



Missouri University of Science and Technology

# Rolla, Missouri

“The Middle of Everywhere”





# What is Missouri S&T?

- A Top 50 Technological Research University
- 6800 students: 5800 Undergrad, 1600 Graduate
- 90% majoring in Engineering, Science, Comp. Sci.
- Ave. Student ACT/SAT: upper 10% in nation
- +60% of Freshmen from upper 20% of HS class
- 20% Out of State Enrollment
- 90% 5 Year Average Placement Rate by Commencement
- Ave. Starting Salary in 2009: +\$57,500
- Highest Starting Salaries of Midwestern Universities\*

# One of America's Great Universities

**U.S. News: Best colleges as ranked by the high school counselors at America's Top 800 high schools:**

## **Missouri S&T ranked 45<sup>th</sup> Overall**

- » #12 public university
- » Ahead of, or tied with, every "Big 12" institution
- » #5 technological research university
- » #2 in Missouri behind Washington Univ in St. Louis

# One of America's Great Universities

## A Top Public University

Missouri S&T ranked 54<sup>th</sup> among the nation's top public universities ([U.S. News & World Report](#), 2008 America's Best Colleges Guidebook, September 2008).

## Top 15 Public Colleges for Getting Rich **#1 in the Midwest!**

Missouri S&T ranked 12<sup>th</sup> on Forbes magazine's list of "Best Public Colleges for Getting Rich" ([www.forbes.com](#), Aug. 2008)

## Top 20 STEM Research University

Missouri S&T named in Academic Analytics' "Top 20 Specialized Research Universities - STEM" ([www.academicanalytics.com](#), Jan. 2008)

## Top 25 Starting Salaries **#1 in the Midwest!**

Missouri S&T named in payscale.com's list of highest average starting salaries for graduates ([www.payscale.com](#), Aug. 2008)

## Top 25 Entrepreneurial Campus

Missouri S&T ranked 22<sup>nd</sup> on Forbes 's list of "America's Most Entrepreneurial Campuses" ([www.forbes.com](#), Oct. 22, 2004).

## Top 25 Connected Campus

Missouri S&T named in Princeton Review's "America's 25 Most Connected Campuses" ([www.forbes.com](#), Jan. 19, 2007).

## Top 30 Safest College Campuses

Missouri S&T ranked #27 in Reader's Digest's "Campus Safety Survey" ([www.rd.com](#), 2008).

## Top 50 Engineering School

Missouri S&T ranked 48<sup>th</sup> among the nation's best engineering schools ([U.S. News & World Report](#), 2007 America's Best Colleges Guidebook, September 2007).

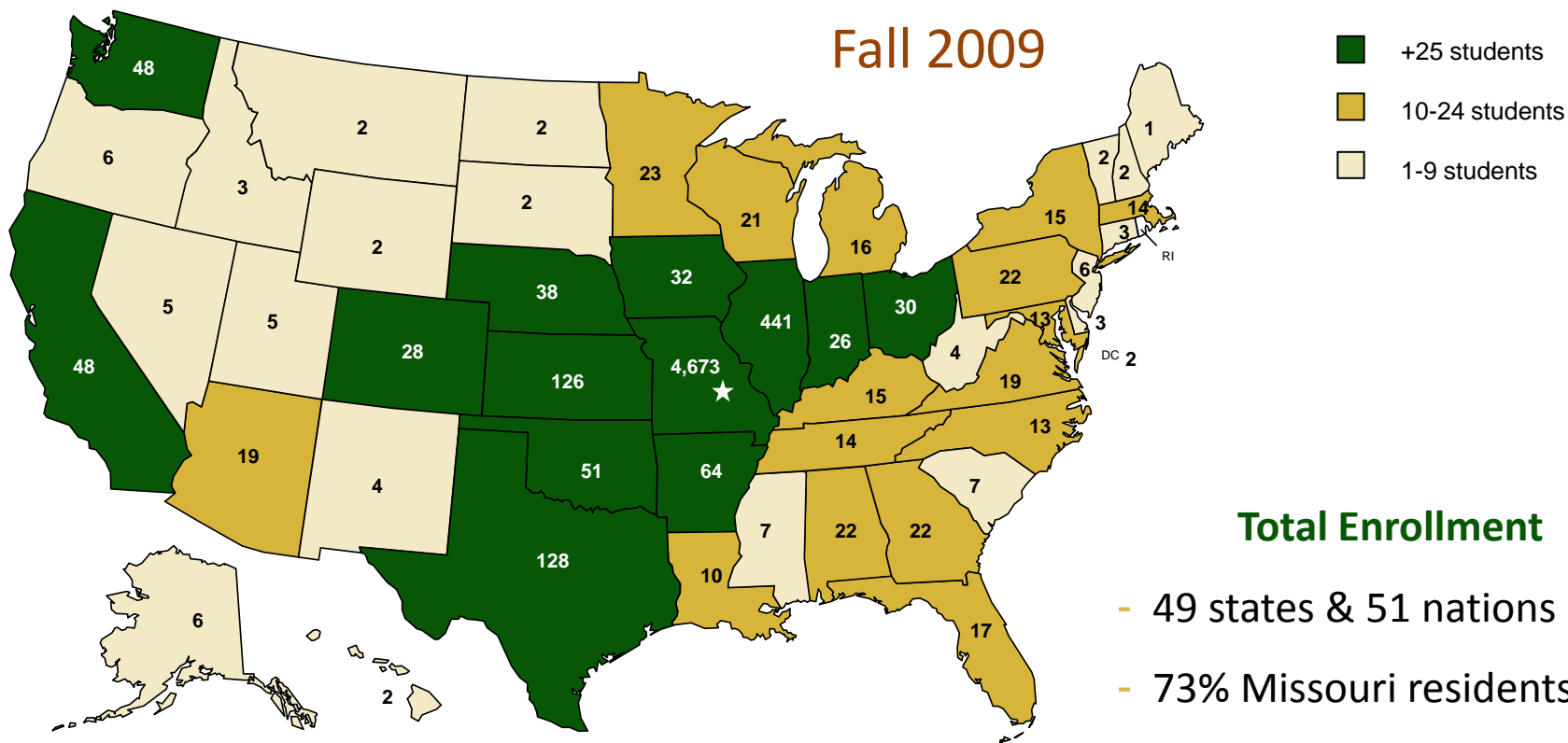
## Top 65 Public Educational Value

Missouri S&T ranked 62<sup>nd</sup> among America's public universities by Kiplinger.com's "2008 Best Values in Education," ([www.kiplinger.com](#), 2008).

# Technological Research Universities

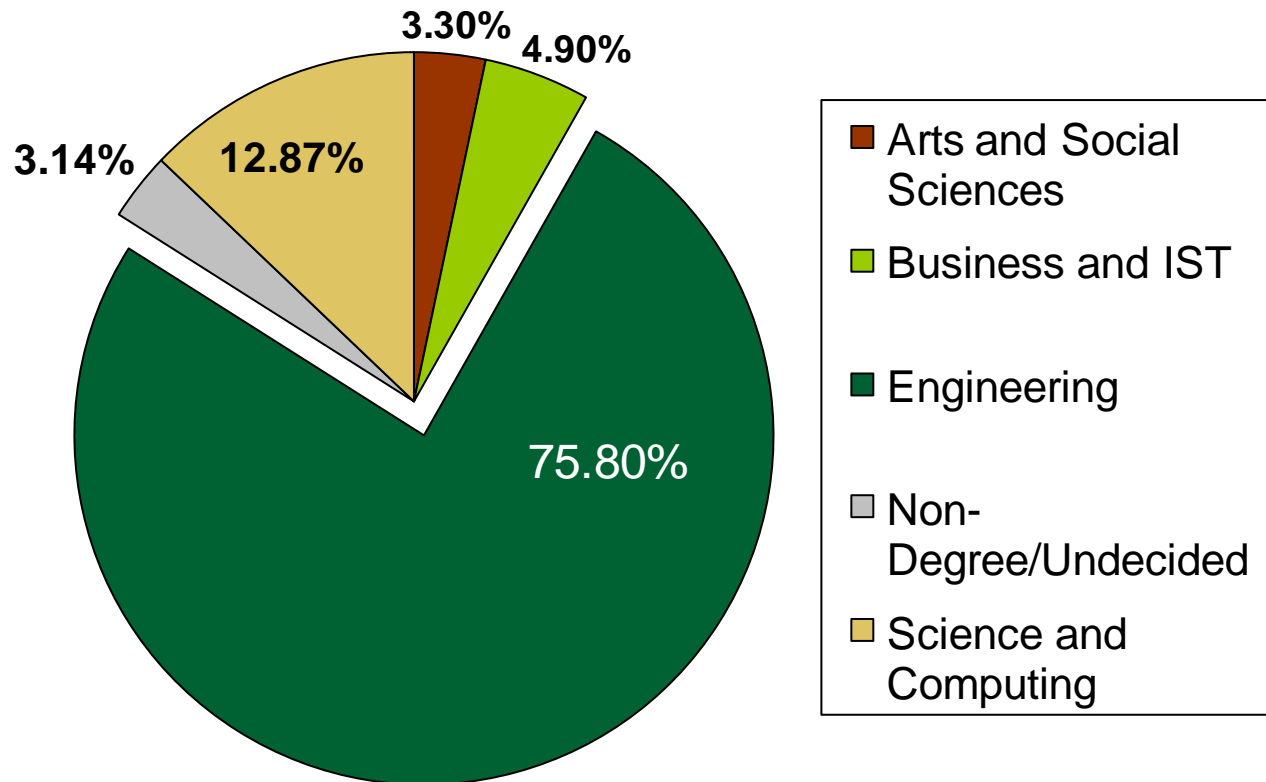


# Students' Home States



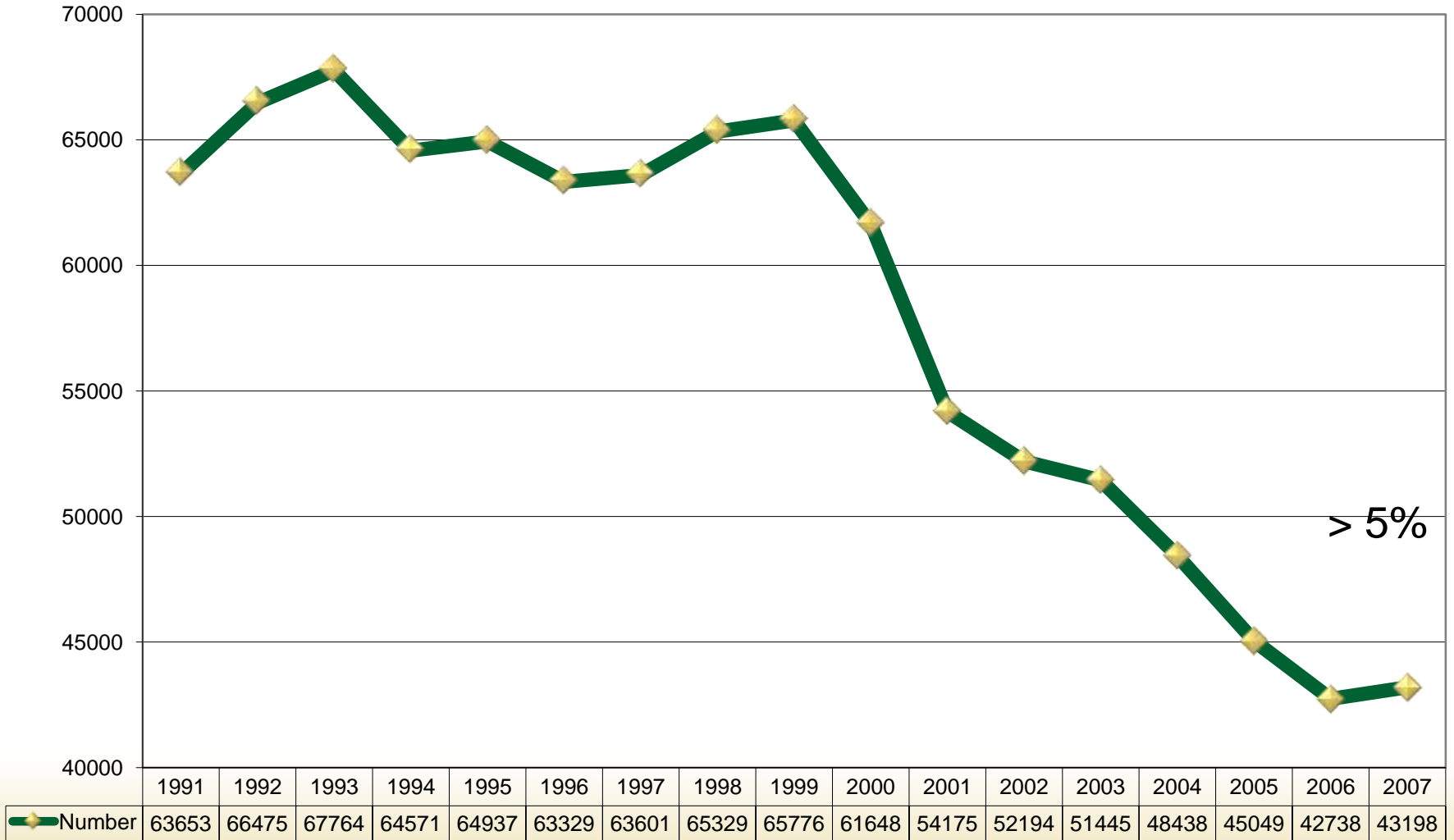
**Missouri S&T: 90% Engineering, Science, & Computing Majors**  
**21<sup>st</sup> in Nation for Largest Undergraduate Engineering Enrollment (Prism 2008)**  
**23<sup>rd</sup> in Nation for Number of BS Engineering Degrees Granted (Prism 2009)**

### Fall 2009 All Students by Academic Field



# 20,000 Fewer Potential Engineering Majors

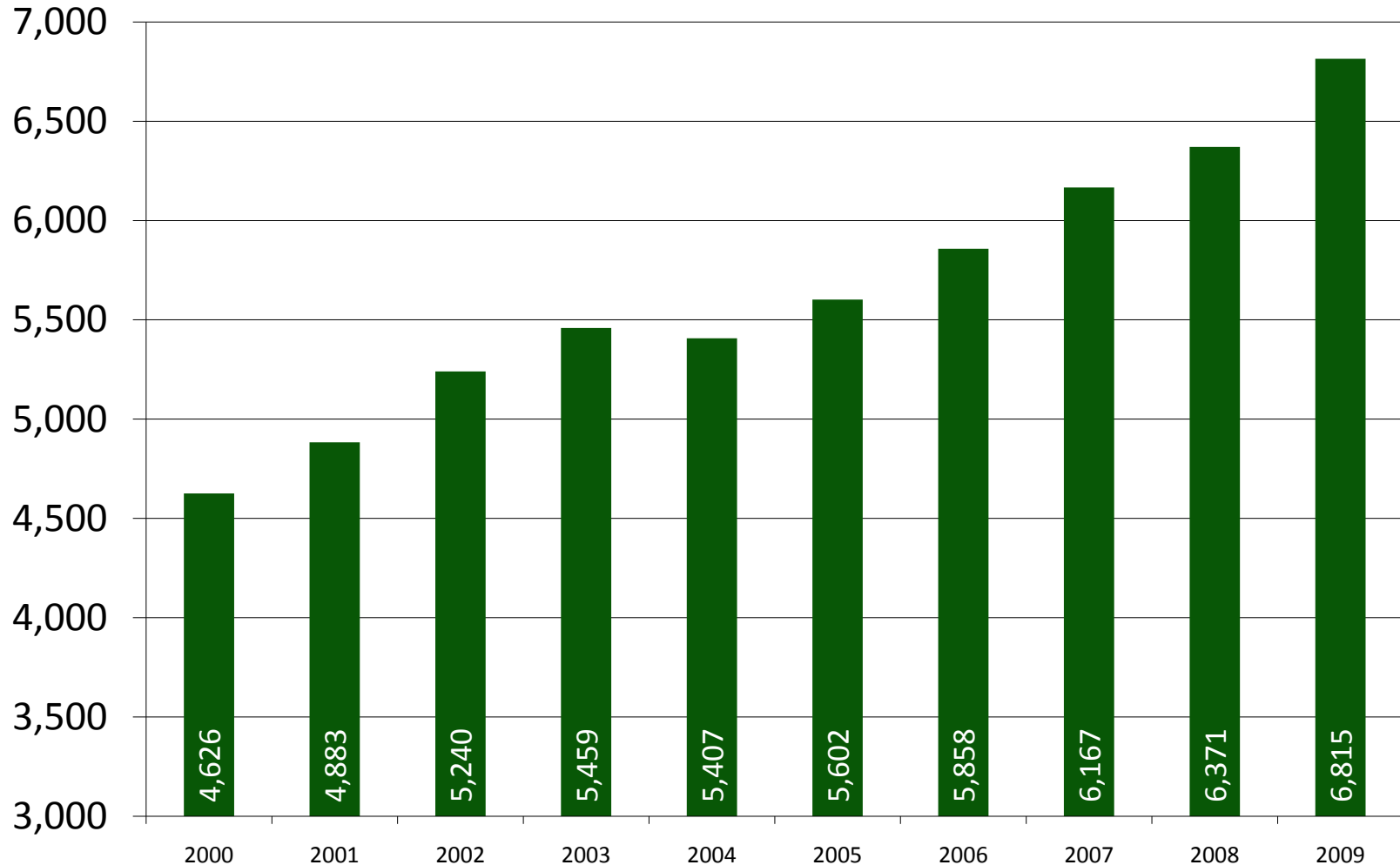
## College Bound ACT Tested Students Interested in Any Engineering Field



SOURCE: ACT EIS 2008

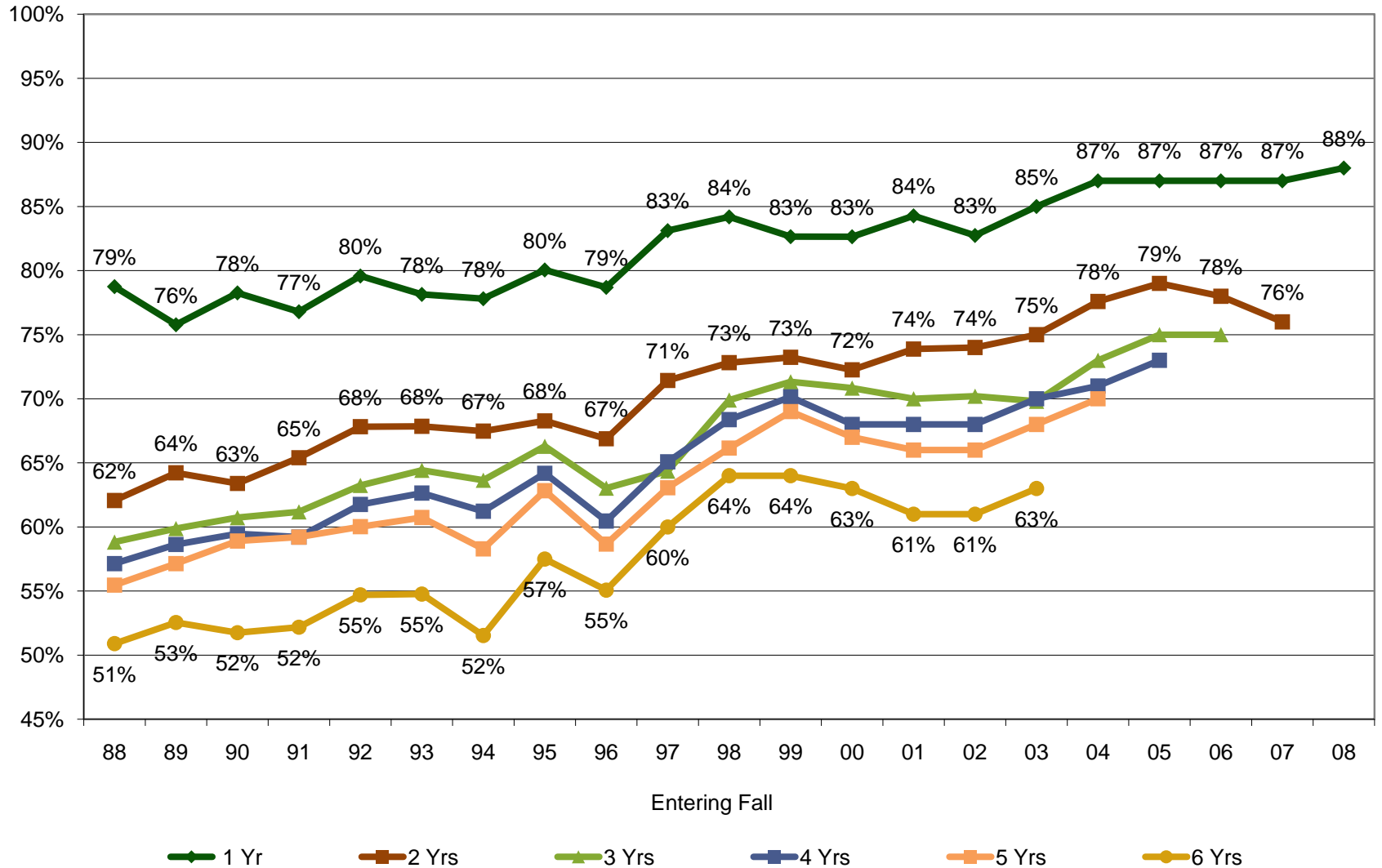
# Total Enrollment: Fall 2000 – Fall 2009

47% Enrollment Growth: 2,189 Additional Students



**Since 2004: 60% of growth due to increased retention**

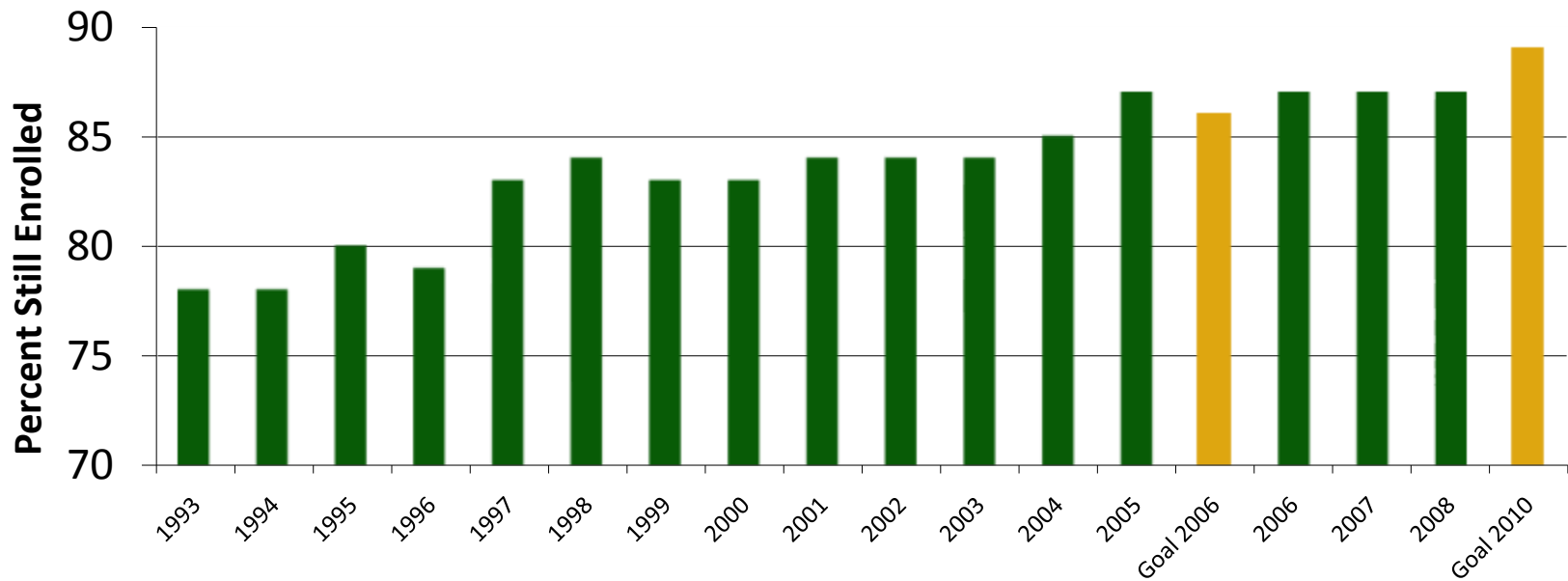
# Freshman Retention and Graduation Rates



# Student Retention

Status in Fall Semester After One Year

Since 2004, 60% of Growth due to Retention Increase



## Graduation Rates

General Student Body:

2000

52%

2005

64%

# S&T Student Success Rates

## ● Retention Rates

	<u>2000</u>	<u>2008</u>
» General Student Body:	82%	87%
» Female Students:	88%	90%
» Minority Students:	94%	90%
» Student Athletes:	88%	90%
» <b>CAMPUS GOAL:</b>	N/A	<b>90%</b>

## ● Graduation Rates

	<u>2000</u>	<u>2008</u>
» General Student Body:	52%	62%
» Female Students:	66%	71%
» Minority Students:	41%	73%
» Student Athletes:	69%	71%
» <b>CAMPUS GOAL:</b>	N/A	<b>70%</b>

# Why Student Leave S&T

## Personal Reasons:

- Family issues – needed at home
- Girlfriend/Boyfriend issues
- Bad & overpriced dorm & food
- Too small of a town/Nothing to do
- Just not the right fit
- Wanted to get away from home
- Wanted to move closer to home

## Academic Issues:

- Too hard/Grades lower than expected
- Changed major/preferred at another institution
- Felt university was too focused on Engineering/Not enough different liberal arts programs/classes
- Advisor/Instructor not helpful enough

## Financial Issues:

- Cost/Financial
- Cannot borrow enough
- Parents will not pay

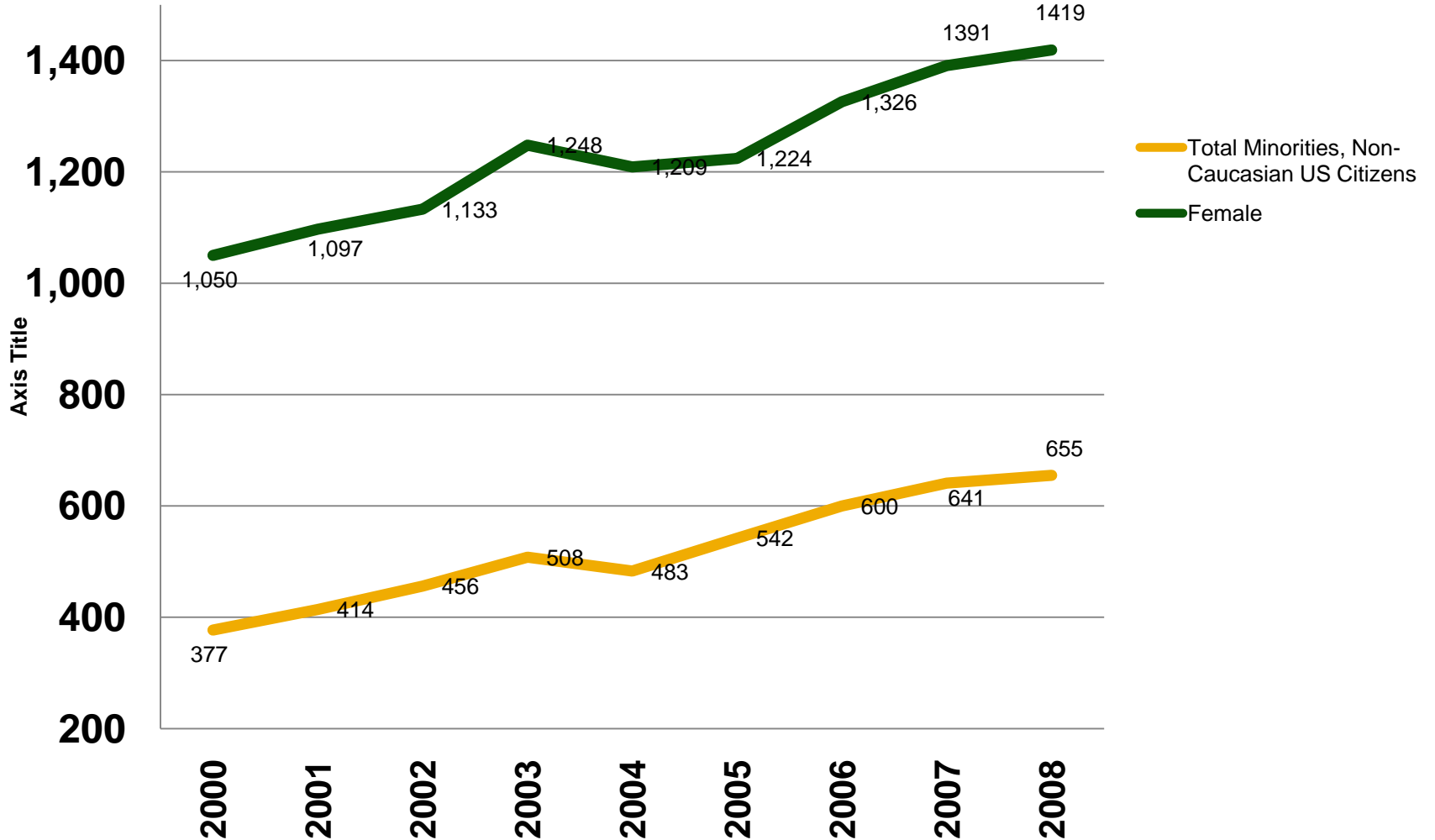
# Strategic Plan

**GOAL 2.1:** Grow overall enrollment to 6,550 by 2011-12 with diversity that reflects the State of Missouri and the global environment in which we compete.

	Actual					Goals
	2000	2005	2006	2007	2008	2012
<b>Total Enrollment</b>	4,626	5,602	5,858	6,167	6,371	6,550
<b>Undergraduate Students</b>	3,698	4,313	4,515	4,753	4,912	4,800
<b>Graduate Students</b>	928	1,289	1,343	1,414	1,459	1,750
<b>Freshmen Class</b>						
	696	914	977	1,051	1,056	975
<b>International Freshmen</b>	15	21	36	16	35	49
<b>Transfer Class</b>						
	210	314	266	276	286	300
<b>International Transfers</b>	9	17	25	17	17	15
<b>American Indian/Alaskan Native</b>						
	24	20	20	33	33	36
<b>Asian-American</b>						
	117	131	198	198	191	240
<b>Black, Non-Hispanic</b>						
	159	200	245	271	299	335
<b>Hispanic-American</b>						
	53	104	137	139	132	190
<b>Undergraduate International</b>	96	80	98	105	127	240
<b>Total Female</b>						
	1,071	1,224	1,326	1,391	1,419	1,500
<b>Undergraduate Female</b>						
	860	945	1,016	1,052	1,101	1,135
<b>Graduate Female</b>						
	211	279	310	339	318	365
<b>Freshman Female</b>						
	196	168	221	215	273	275
<b>Transfer Female</b>						
	45	91	70	74	67	90
<b>On-campus</b>						
	4,393	5,101	5,389	5,649	5,768	5,825
<b>Distance Education</b>						
	233	501	469	518	603	725

# Enrollment Diversity

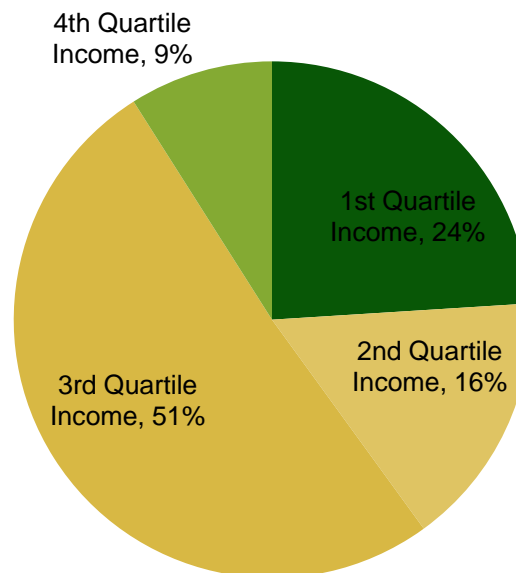
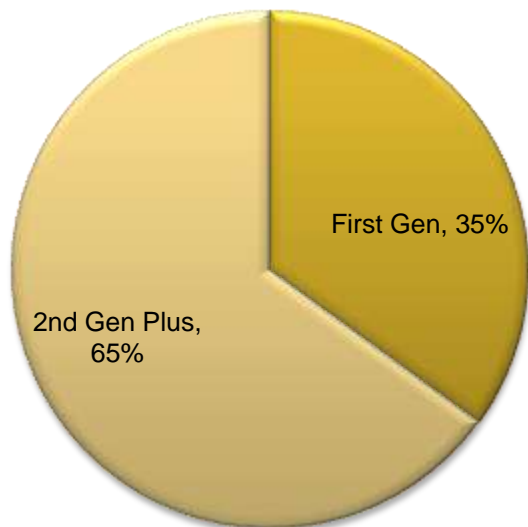
**35% increase in Female Students**  
**86% increase in Minority Students**



# **How Did Missouri S&T Make Immediate Gains in Retention and Graduation Rates?**

# Knowing Our Students

## Profile Factors Likely to Impact Retention





# Undergraduate Demographics & Psychographics

- Average Age: 21.6 years old
- Gender:
  - » 23% Female
  - » 77% Male
- First Generation College Students:
  - » 2005-06: 37%
- Residency:
  - » Missouri Residents: 76%
  - » Out-State Students: 22%
  - » International: 2%
- Ethnicity:
  - » African-American: 4%
  - » Asian-American: 3%
  - » Caucasian: 83%
  - » Hispanic: 2%
  - » Native-American: 1%
  - » Non-resident, International: 2%
  - » Not Disclosed: 5%
- First Generation: 36%
- From a Community <40,000: 55% approx.
- Average Family Income: \$72,000
- Average Indebtedness at Graduation:
  - » \$21,000 USD approx.
- High Financial Need (Pell qualifier): 24%
- Freshmen with Credit Cards:
  - » 24%
- Students with PCs:
  - » 94%
  - » +70% laptops
  - » 7% Macs
- Students with Cell Phones
  - » 97%

# Using the Scientific Process

- **STEP ONE: Identify the Problem**

# Core Retention Assessments:

Knowing Why Students Chose your Campus, Stayed or Left

1. New Student Survey (prior to start of classes)
2. Withdrawal Survey (prior to cancelling classes)
3. Phone/Email Survey of Non-Returning Students (2-4 weeks prior to start of semester)
4. Student Satisfaction Survey (all returning students)
5. Graduating Student Survey (prior to commencement or within the first six months after graduating)

# Cohort Retention Rates by Level

	<u>1 Yr</u>	<u>2 Yrs</u>	<u>3 Yrs</u>	<u>4 Yrs</u>	<u>5 Yrs</u>	<u>6 Yrs</u>
1987	75%	60%	55%	53%	51%	46%
2001	84%	74%	70%	68%	66%	64%
2002	83%	74%	70%	68%	66%	
2003	85%	75%	70%	70%		
2004	87%	78%	73%			
2007	87%	79%				
2007	87%					

# Changes to Improve Retention/Graduation

## S&T's "Low Hanging Fruit"

1. Follow-up Calling/Survey Program
2. Early Warning System Report
3. Incomplete grade time limit change
4. Repeat course GPA adjustment policy
5. Scholarship Reinstatement Policy
6. All BS degree programs reduced to 128 hours
7. Added degree programs most often requested by existing students: Business, IST, Technical Communication
8. Create better understanding of faculty and student expectations. Actively embrace the "social norming" concept.
9. Address group building (making friends) and study skills (not flunking out) in all orientation and opening week activities

# Phone Calls / Telecounseling

- 2-6% immediate improvement reported
- Great data and problem identification tool
- Relatively low expense



# Questions for Phone Survey

- Introduction - *Hello. This is (state your full name) from the University of Missouri – Rolla. May I please speak with (student's first name).*
- Establish Rapport and Authenticity, Verify Student's major, city, high school
- Purpose of Call - *Hi (student's first name). The purpose for my call is let you know that our records indicate that you have not registered to take classes in the (fall or spring semester). I wanted to know if there is anything I can do to assist you with registering for classes.*
- IF THE STUDENT IS PLANNING TO RE-ENROLL, REMIND THEM OF THE ONLINE PROCESS USING Joe'SS and PROVIDE THEM WITH A CONTACT PERSON IN THE REGISTRARS OFFICE, ALONG WITH THE PHONE NUMBER, IF THEY NEED ADDITION ASSISTANCE. CLOSE BY TELLING THE STUDENT WE LOOK FORWARD TO SEEING THEM IN AUGUST AND THAT CLASSES BEGIN ON MONDAY, AUGUST 20.
- Follow-up with a thank you email, key dates and contacts.
- IF THE STUDENT IS NOT RE-ENROLLING ASK THE FOLLOWING QUESTIONS AS RELEVANT:
  1. Are you enrolling at another school?
  2. Which school?
  3. What are you studying?
  4. Is this a change from what you had planned to study? (if it is an area offered at S&T: Were you aware that S&T offers that major?)
  5. What student activities did you actively participate in?
  6. What would you say was the most important reason that you decided not to return to S&T?  
If the student had problems, and the response reflects a S&T-based problem or set of problems:
    7. Did you talk to the person/office you had trouble with to try to correct this problem?
    8. Did you talk to anyone else to try to correct the problem?
    9. What would you tell us that needs to be improved?
    10. What would have kept you at S&T?  
If the response reflects mostly problems on the student's part vs. S&T's:
    11. Did you speak with anyone to try to correct the problem?
    12. Was there something else that we could have done to help you that wasn't done?
  13. Do you plan to return to S&T? When? Is there someone here that you would like to call you concerning your returning?
  14. Would you recommend S&T to another student? Why or why not?
  15. Had you visited the campus before enrolling at S&T?
  16. How many weekends per month did you spend at home? (What activities did you engage in when you did stay on campus?) (omit for Rolla residents)
  17. When you initially enrolled, did you intend to graduate from S&T or transfer classes to another institution? (if graduate from S&T, ask why the change)
- Gather as much relevant information as the student wants to share.
- Follow up with thank you letter.



# Questions for Email Survey

- Students that weren't able to be reached by phone were emailed.

Hello, (*student name*). My name is (*your full name*) and I work in the (*office*) Office at S&T. I also called and left a message a little while back. The reason that I'm calling/e-mailing is that we noticed that you were registered last semester but aren't registered for this coming fall semester. Were you planning on returning to S&T? If you are, I'd be glad to help you get registered. Just let me know what I can do. A quick reminder, the last day to register is August 16th and classes begin on August 20th.

If you're not returning, that's okay, we understand, but we would really appreciate it if you could give us some feedback on what made you decide to leave and what we can do better in the future. I've included some questions below and if you could please let me know your response, I would greatly appreciate it. If you'd like to discuss this over the phone, either let me know a number and a good time to call or you can call me at my direct number, 573-341-XXXX, or you can call our toll-free number and just ask to be transferred to me. Our toll-free number is 1-800-522-0938. If it's after business hours, you can call the (*office*) main number, 573-341-XXXX, and leave a message. I look forward to hearing from you!

Here are the survey questions that I had:

Are you enrolling at another school?

If so, which school?

What are you studying?

Is this a change from what you had planned to study?

What student activities did you actively participate in?

What would you say was the most important reason that you decided not to return to S&T?

What would you tell us that needs to be improved?

What would have kept you at S&T?

Was there something that we could have done to help you that wasn't done?

Did you have any problems with any particular department or office on campus?

If so, did you talk to them or someone about it?

Do you plan to return to in the future S&T?

Would you recommend S&T to another student? Why or why not?

Had you visited the campus before enrolling at S&T?

About how many weekends per month did you spend at home?

What activities did you engage in when you did stay on campus?

When you initially enrolled, did you intend to graduate from S&T or transfer classes to another institution?

Again, I thank you very much for taking the time to answer these questions and we wish you all the best in your future endeavors.

Sincerely,

(*your name*)



# Summarizing the non-returning freshmen data 2001-2008

- The average student leaving is a good a student: ACT: upper 20% in nation, High School Class Rank: upper 25%
- The non-returning students scored on average 1.16 points lower than those returning students on the ACT (range is 0.6-1.8)
- Non-returnees averaged 8.8 percent lower in class rank than their staying counter parts (range is 7.5 to 10.5)
- Non-returnees scored on average .24 points lower in HS GPA (range is .21 - .25)
- Non-returnees earned an average GPA of .775 lower than their returning counterparts (range is .64 - .86)
- Non-returnees also averaged almost a full point lower GPA when compared to their HS GPA while their counterparts averaged less than a .5 drop from their HS GPA to their GPA.

# Common Themes 2001-2008

- Why did you leave?
  - » Changed majors
  - » Financial / too expensive
  - » Low Grades
  - » Rolla is boring / too small

# Do you plan to return to S&T?

- 68% students do not plan to return to S&T
- 25% plan to return  
(“**Stop-outs**”: this includes students leaving for military service)
- 7% were not certain of their plans

# What would have kept you at S&T?

- » #1 ANSWER: “Nothing would have kept me at S&T”
- » More money or financial aid
- » More majors or non-engineering degrees
- » Higher or better grades



# Would you recommend S&T to another student?

- 38% would recommend to another student unconditionally
- 39% would recommend for engineering/science/math only
- 4% would recommend with a caveat (it's not for everyone, if they wanted to go away)
- 5% said no

# Calling Schedules

- 2-8 weeks prior to start of semester/quarter
- Follow-up calling after the official census date each fall and spring

## Staff vs. Student Callers

- **USE STAFF!!!**
- Preferably a staff member with the ability to re-admit and re-enroll the student

# Annual Retention Audit Report

- Highlights the results of the Spring 2007 and Fall 2007 Phone Survey
- Survey involves Retention of First-Time Full-Time Degree Seeking Freshmen Students



# Retention Report **Process**

1. **Registrar:** Prepares list of degree-seeking, non-registered FS06 first-time, full-time Freshmen.
2. **Develop spreadsheet calling list:** Student's name, email, phone #, hometown, major, S&T GPA
3. **Make Telephone calls:** Best contact times were from 10 am – 2 pm or 6 to 8 pm
4. **Emails:** Initially sent to students with incorrect or no phone numbers and students who we could not reach by phone.
5. **Follow-up:** Follow-up thank you letter sent to contacted students
6. **Compile results:** Prepared an overview PowerPoint
7. **Submit results:** PowerPoint was submitted to the Dean of Enrollment Management and Vice Provost of Undergraduate Studies

# First-Time Full-Time Degree-Seeking Students

- Total Fall 2007 first-time full-time degree-seeking students was **935**.
- **32** (3.4%) did not return for the Spring 2007 term. *1 of the 32 students re-enrolled for Fall 2007*
- **67** (7.1%) did not return for the Fall 2007 term.
- **14** students didn't return due to academic deficiency
- **5** students withdrew during the Spring 2007 semester
- **4** students were enrolled at time of calling but were cancelled due to non-payment
- **2** students were going on a 2-year mission trip and then returning to S&T. For purposes of this survey, they were not counted as non-returning.
- **1** student was deceased – New cohort data is 934

**First Year Retention Rate: 87%**

# Freshmen Retention

## After One and Six years

- Status in Fall Semester After One Year

	92	93	94	95	96	97	98	99	00	01	02	03	04	05	06
<b>Stayed</b>	80	78	78	80	79	83	84	83	83	84	83	85	87	87	87
<b>Left</b>	20	22	22	20	21	17	16	17	17	16	17	15	13	13	13

- Status in Fall Semester After Six Years

	92	93	94	95	96	97	98	99	00
<b>Degree</b>	55	55	52	57	55	60	63	64	63
<b>Still here</b>	5	4	5	4	4	3	3	4	4
<b>Left</b>	41	41	43	39	41	38	34	32	33



# Full-time, Degree Seeking Freshmen

## Retention after One and Six years

	92	93	94	95	96	97	98	99	00	01	02	03	04
<b>Status in Fall Semester After One Year</b>													
Stayed (%)	80	78	78	80	79	83	84	83	83	84	83	85	87
Left (%)	20	22	22	20	21	17	16	17	17	16	17	15	13
<b>Status in Fall Semester After Six Years</b>													
Degree (%)	55	55	52	57	55	60	63	64					
Still here (%)	5	4	5	4	4	3	3	4					
Left (%)	41	41	43	39	41	38	34	32					



# Statistics Comparison

First-time freshmen class (full-time, degree seeking)

	FS97	FS98	FS99	FS00	FS01	FS02	FS03	FS04	FS05	FS06	FS07	FS08
<b>Count</b>	693	721	680	674	693	788	871	839	879	935	102 8	103 8
<b>HS GPA</b>	Not tracked	Not tracked	3.52	3.53	3.46	3.48	3.55	3.59	3.58	3.62	3.57	3.54
<b>% Rank</b>	84.6	84.5	83.6	83.4	80.5	80.3	80.8	80.9	80.5	79.9	79.7	81.3
<b>ACT</b>	28.2	28.0	27.7	27.3	26.8	27.3	27.2	27.1	27.1	27.1	27.3	27.3
<b>MST GPA</b>	2.88	2.87	2.88	2.90	2.91	3.03	2.90	3.03	2.94	3.00	3.03	3.00

NOTE: Fewer high schools are providing class rankings. % Rank reflects the class rank % of students from high schools providing a class rank.



# Comparison :Enrolled and Not-Enrolled First-time Freshmen class (Full-time, Degree seeking)

	FS00		FS01		FS02		FS03		FS04		FS05		FS06		FS07		FS08	
Status	Enrolled	Not-Enrolled	Enrolled	Not-Enrolled	Enrolled	Not-Enrolled	Enrolled	Not-Enrolled	Enrolled	Not-Enrolled	Enrolled	Not-Enrolled	Enrolled	Not-Enrolled	Enrolled	Not-Enrolled	Enrolled	Not-Enrolled
Count	557	117	584	109	652	136	737	134	733	106	767	112	810	125	888	140	909	129
%	82.6	17.4	84.3	15.7	82.7	17.3	84.6	15.4	87.4	12.6	87.3	12.7	86.6	13.4	86.4	13.6	87.6	12.4
HS GPA	3.57	3.34	3.5	3.25	3.52	3.27	3.59	3.35	3.62	3.41	3.60	3.38	3.60	3.48	3.59	3.46	3.57	3.39
% Rank	84.7	76.8	82.1	71.6	81.5	74.0	82.4	71.9	82.0	73.7	81.6	71.6	81.3	69.3	81.2	70.5	82.8	71.2
ACT	27.4	26.8	27.1	25.3	27.5	26.5	27.4	26.3	27.2	26.2	27.3	25.7	27.2	26.3	27.4	27.0	27.4	26.5
MST GPA	3.03	2.26	3.04	2.18	3.16	2.41	3.21	2.35	3.26	2.62	3.22	2.55	3.30	2.59	3.14	2.33	3.11	2.20



# First-Time Full-Time Degree-Seeking Students

- That 103 comes from:
  - » **32** that did not return for the Spring 2007 term (less **1** returning student).
  - » **67** that did not return for the Fall 2007 term.
  - » **5** that withdrew during the Spring 2007 semester
- Data points examined on 103 students:
  - » Geographic Origin
  - » Initial Major
  - » Gender
  - » Ethnicity
  - » Cumulative GPA
  - » Composite ACT
  - » Financial Aid information

# Geographic Origin

## First-Time Full-Time Degree-Seeking Students

### All Fall 2007 (934)

### Non-Returning (103)

- Missouri  
741 (79.4%)
- Non-Missouri  
185 (19.8%)
- International  
8 (0.9%)

- Missouri  
76 (73.8%)
- Non-Missouri  
26 (25.2%)
- International  
1 (0.1%)



# Geographic Origin

## Missouri Counties

### First-Time Full-Time Degree-Seeking Students

#### All Fall 2007 (741)

#### Non-Returning (76)

• SAINT LOUIS	192	25.9%
• SAINT CHARLES	75	10.1%
• JACKSON	51	6.9%
• PHELPS	42	5.7%
• JEFFERSON	30	4.0%
• CLAY	23	3.1%
• GREENE	22	3.0%
• SAINT LOUIS CITY	21	2.8%
• PLATTE	19	2.6%
• PULASKI	19	2.6%
• FRANKLIN	17	2.3%
• COLE	15	2.0%
• BOONE	14	1.9%
• CASS	11	1.5%
• LINCOLN	10	1.3%
• SAINT FRANCOIS	10	1.3%
• CAPE GIRARDEAU	9	1.2%
• CAMDEN	8	1.1%
• Students in Counties with 6 or fewer		
	153	20.6%

• SAINT LOUIS	18	23.7%
• PHELPS	8	10.5%
• SAINT CHARLES	7	9.2%
• PLATTE	6	7.9%
• JACKSON	5	6.6%
• COLE	4	5.3%
• JEFFERSON	4	5.3%
• MARIES	4	5.3%
• PULASKI	4	5.3%
• SAINT LOUIS CITY	3	3.9%
• GREENE	2	2.6%
• HOWELL	2	2.6%
• CASS	1	1.3%
• CLAY	1	1.3%
• FRANKLIN	1	1.3%
• LINCOLN	1	1.3%
• MORGAN	1	1.3%
• OSAGE	1	1.3%
• SHELBY	1	1.3%
• TEXAS	1	1.3%
• WASHINGTON	1	1.3%

Note: Due to rounding, percentages may not total 100%.



# Initial Major

## First-Time Full-Time Degree-Seeking Students

### All Fall 2007 (934)

• FR-MC ENG	146	15.6%	• AP MATH-BS	11	1.2%
• FR-AE ENG	93	9.9%	• FR-PE ENG	10	1.1%
• FR-CH ENG	91	9.7%	• PSYCH-BS	7	0.7%
• FR-EL ENG	73	7.8%	• FR-CR ENG	6	0.6%
• FR-CP ENG	67	7.2%	• HIST-BA	6	0.6%
• FR-UN-ENG	65	7.0%	• FR-GE ENG	5	0.5%
• FR-CV ENG	61	6.5%	• FR-ID ENG	5	0.5%
• FR-ARC-ENG	60	6.4%	• BIO SC-BA	4	0.4%
• CMP SC-BS	58	6.2%	• GL&GPH-BS	4	0.4%
• FR-NU ENG	29	3.1%	• IST-BS	4	0.4%
• BIO SC-BS	22	2.4%	• ENGL-BA	3	0.3%
• BUS&MS-BS	19	2.0%	• FR-EV ENG	2	0.2%
• FR-MI ENG	18	1.9%	• PSYCH-BA	2	0.2%
• CHEM-BS	16	1.7%	• UN-A&S-UN	2	0.2%
• FR-MT ENG	15	1.6%	• CH ENG-BS	1	0.1%
• PHYSIC-BS	14	1.5%	• MT ENG-BS	1	0.1%
• FR-ENG MG	13	1.4%	• UN-M&IS-UN	1	0.1%

• Engineering	761	81.5%
• Non-Engineering	173	18.5%

### Non-Returning (103)

• FR-MC ENG	19	18.4%
• CMP SC-BS	10	9.7%
• FR-AE ENG	10	9.7%
• FR-CP ENG	9	8.7%
• FR-EL ENG	6	5.8%
• BUS&MS-BS	5	4.9%
• FR-CV ENG	5	4.9%
• CHEM-BS	4	3.9%
• FR-ARC-ENG	4	3.9%
• FR-NU ENG	4	3.9%
• FR-UN-ENG	4	3.9%
• FR-CH ENG	3	2.9%
• FR-ENG MG	3	2.9%
• AP MATH-BS	2	1.9%
• BIO SC-BA	2	1.9%
• BIO SC-BS	2	1.9%
• FR-MI ENG	2	1.9%
• FR-PE ENG	2	1.9%
• PHYSIC-BS	2	1.9%
• UN-A&S-UN	2	1.9%
• FR-EV ENG	1	1.0%
• FR-MT ENG	1	1.0%
• GL&GPH-BS	1	1.0%

• Engineering	73	70.9%
• Non-Engineering	30	29.1%

Note: Due to rounding, percentages may not total 100%.

# Gender

## First-Time Full-Time Degree-Seeking Students

### All Fall 2007 (934)

### Non-Returning (103)

- Male  
718 (76.9%)
- Female  
216 (23.1%)

- Male  
87 (84.5%)
- Female  
16 (15.5%)

# Ethnicity

## First-Time Full-Time Degree-Seeking Students

### All Fall 2007 (934)

### Non-Returning (103)

● WHITE	807 (86.4%)
● BLACK NON-HISPANIC	44 (4.7%)
● UNKNOWN ETHNIC ORIGIN	28 (3.0%)
● ASIAN/PACIFIC ISLANDER	24 (2.6%)
● HISPANIC	19 (2.0%)
● NONRES ALIEN	9 (1.0%)
● AM.INDIAN/ALASKAN NA	3 (0.3%)

• WHITE	97 (94.2%)
• UNKNOWN ETHNIC ORIGIN	3 (2.9%)
• ASIAN/PACIFIC ISLANDER	2 (1.9%)
• HISPANIC	1 (1.0%)
• AM.INDIAN/ALASKAN NA	0 (0%)
• BLACK NON-HISPANIC	0 (0%)
• NONRES ALIEN	0 (0%)

Note: Due to rounding, percentages may not total 100%.

# Cumulative GPA

## First-Time Full-Time Degree-Seeking Students

### All Fall 2007 (934)

### Non-Returning (103)

- 4.000 – 3.500      343    (36.7%)
- 3.490 – 3.000      279    (29.9%)
- 2.900 – 2.500      150    (16.0%)
- 2.490 – 2.000      85     (9.1%)
- 1.900 – 0.000      73     (7.8%)
- N/A\*                    4      (0.4%)

\*Withdrew before completing the Fall 2007 term.

- 4.000 – 3.500      16     (15.6%)
- 3.490 – 3.000      24     (23.3%)
- 2.900 – 2.500      21     (20.4%)
- 2.490 – 2.000      17     (16.5%)
- 1.900 – 0.000      21     (20.4%)
- N/A\*                    4      (3.8%)

\*Withdrew before completing the Fall 2007 term.



# Composite ACT

## First-Time Full-Time Degree-Seeking Students

### All Fall 2007 (934)

### Non-Returning (103)

•	35	7	0.7%
•	34	11	1.2%
•	33	33	3.5%
•	32	41	4.4%
•	31	84	9.0%
•	30	100	10.7%
•	29	53	5.7%
•	28	81	8.7%
•	27	97	10.4%
•	26	73	7.8%
•	25	72	7.7%
•	24	72	7.7%
•	23	44	4.7%
•	22	42	4.5%
•	21	32	3.4%
•	20	18	1.9%
•	19	8	0.9%
•	18	3	0.3%
•	17	2	0.2%
•	16	1	0.1%
•	N/A	60	6.4%

•	35	1	1.0%
•	34	1	1.0%
•	33	1	1.0%
•	32	5	4.9%
•	31	5	4.9%
•	30	6	5.8%
•	29	5	4.9%
•	28	7	6.8%
•	27	11	10.7%
•	26	12	11.7%
•	25	10	9.7%
•	24	8	7.8%
•	23	10	9.7%
•	22	9	8.7%
•	21	3	2.9%
•	20	2	1.9%
•	N/A	7	6.8%

Note: Due to rounding, percentages may not total 100%.



# Financial Aid Information

## First-Time Full-Time Degree-Seeking Students Non-Returning Students (103)

### 2007/2008 FAFSA

- Yes 83 80.6%
- No 20 19.4%

### Eligible for a Pell Grant

- No 80 77.7%
- Yes 18 17.5%
- N/A 5 4.8%

Note: Due to rounding, percentages may not total 100%.



# Financial Aid Information

## First-Time Full-Time Degree-Seeking Students Non-Returning Students (103)

### Student's Expected Family Contribution

● 99999	• 31431	• 16663	• 10577	• 3424
● 76265	• 28932	• 15958	• 9380	• 3191
● 65040	• 27366	• 15090	• 8925	• 2290
● 62519	• 26441	• 15053	• 8077	• 2218
● 59737	• 24900	• 14567	• 7425	• 2171
● 49402	• 24111	• 14510	• 6923	• 1468
● 45717	• 22558	• 13957	• 6517	• 1236
● 45457	• 22257	• 13859	• 6474	• 902
● 45052	• 22000	• 13366	• 6179	• 676
● 40070	• 21215	• 13330	• 6050	• 645
● 38985	• 21098	• 13230	• 5777	• 245
● 37201	• 19691	• 12692	• 5758	• 193
● 36314	• 17905	• 12642	• 4949	• 5
● 34946	• 17497	• 11692	• 4764	• 0
● 34230	• 17117	• 11567	• 3540	• 0
● 33654	• 16998	• 11220	• 3514	• 0
● 32439	• 16943	• 10917		

20 students were N/A

# Target Population

## Spring 2007 Retention Report

- 38 freshmen were contacted
  - » 6 of the 38 enrolled at S&T after Jan. 10
- 32 of the 934 (3.4%) freshmen students enrolled in FS2007 did not return for SP2007
  - » 1 of the 32 students re-enrolled for Fall 2007
- 20 of the 32 (62.5%) students completed the phone survey
  - » 5 of the 20 did not enroll at a college/university for SP2007
  - » 9 of the 20 transferred to another college/university

NOTE: Hard to get an answer due to caller ID; afraid it's a bill collector.



# Background Information

## Spring 2007 Retention Report

- 3 of the 5 not attending a college/university had GPAs under 2.75
- 4 of the 9 transfers had GPAs under 2.75

# Survey Results

## Spring 2007 Retention Report

### Transfer institutions include:

- Pittsburg State (1)
- Columbia College (1)
- Kansas State (1)
- University of Missouri-St. Louis (1)
- Meramec Community College (1)
  - ❖ Plans to return to S&T
- University of Missouri – Columbia (2)
- University of Massachusetts (1)
- University of Memphis (1)

# Survey Results

## Spring 2007 Retention Report

### Reasons for not returning:

- Want to be closer to home (3) *Out-of-state*
- Changed Major (2)
  - ❖ Physical Therapy (1) *S&T offers pre-physical therapy*
  - ❖ Business(1) *Out-of-state can pay less for an instate business degree*
- Poor Grades (1)
- Financial (2) *more money; can go closer to home for less*
- Family issues (1) *father needed a heart transplant; student plans to return.*
- Didn't fit in (2)

# Survey Results

## Spring 2007 Retention Report

### What would have kept you at S&T?

- More money (1)
- I don't know (3)
- Nothing (2)
- Not changing my major (2)
- Better grades (1)

# Survey Results

## Spring 2007 Retention Report

### Additional Comments:

- I would recommend S&T to other students (8)
- Rolla is too small (2)
- I wanted to be close to home (3)
- Nothing to do on weekends (1) *Student was not involved in on-campus activities*
- S&T is great for Engineering (1)

# Target Population

## Fall Retention Report

- 77 freshmen were contacted
  - » 8 of the 77 enrolled at S&T after July 17<sup>th</sup>
  - » 13 of the 77 students were enrolled but cancelled between July 16<sup>th</sup> and August 17<sup>th</sup>
- 67 of the 934 (7.1%) freshmen students enrolled in FS2007 did not return for FS2007
  - » 2 of the 77 students were going on a 2-year mission trip and then returning to S&T. For purposes of this survey, they were not counted as non-returning.
- 37 of the 77 (48.1%) students participated in the phone survey
  - » 35 of the 37 transferred to another college/university in FS2007
  - » 1 will be transferring in 2008



# Survey Results

## Fall Retention Report

### Transfer institutions include:

- University of Missouri – Columbia (8)
- Missouri State University (6)
- Saint Louis University (2)
- University of Colorado (2)
- University of Wyoming (2)
- Driscoll in Philadelphia (1)
- Augsburg College, MN (1)
- California Community College (1)
- Longview Community College (1)
- Jefferson College (1)
- Maple Woods Community College (1)
- Metropolitan Community College, Kansas City (1)
- Northwest Missouri State (1)
- Southern Illinois Univ - Edwardsville (1)
- St. Louis Comm College - Meramec (1)
- Truman State University (1)
- University of Central Missouri (1)
- University of Kentucky (1)
- University of Texas at Austin (1)
- Webster University (1)

Note: Most campuses are close to their home address.

# Survey Results

## Fall Retention Report

### Reasons for Not Returning:

- Changed major (15)
- Cost/Financial (12) [6 were out-of-state, 5 transferred to community college]
- Bad & overpriced dorm food (6)
- Too small of a town/Nothing to do (5)
- Just not the right fit (5)
- Felt university was too focused on Engineering/Not enough different liberal arts programs/classes (4)
- Advisor/Instructor not helpful enough (3)
- Too hard/Grades lower than expected (3)
- Wanted to get away from home [St. James, Rolla] (2)
- Wanted to move closer to home (2)
- Issue with department chair, not happy with how labs were designed and implemented (1)
- Personal Reasons (1)

# Survey Results

## Fall Retention Report

### Reasons for Not Returning – Changed Major

- Architecture
- Biology
- Biology/Psychology/Physical Therapy
- Business Administration
- Business Law
- Chemistry/Pharmacy
- Creative Writing
- Elementary Education
- English
- Political Science (2)
- Pre-Med with emphasis in Biology (2)
- Secondary Education
- Speech Pathology

# Survey Results

## Fall Retention Report

### What would have kept you at S&T?

- Nothing (7)
- Money – cheaper, more scholarships, especially for out-of-state (6)
- More girls, more diverse student body (3)
- Larger town (2)
- More options for Res Life and meal plans (2) – allow to move off campus after 1 year
- Student/Faculty interest and enthusiasm for subjects other than Engineering (1)
- More liberal arts activities (1)

# Survey Results

## Fall Retention Report

### 26 Students **Would** Recommend S&T

- Recommend for Engineering (9)
- Good job, good careers; Good school, good education, nice campus (3)
- Good classes, good professors, good advisors (3)
- Only recommend for Missouri residents (2)
- If they fit the personality, liked a small town (2)
- The school was incredible academically and provides great educational and social experience.
- Have already recommended
- Good advisors - Really helped, didn't just try to convince student to stay at S&T
- Recommend to introverted people, not for social butterflies
- Strong school with a lot of excellent programs and enthusiastic teachers.
- Would highly recommend and am proud to have experienced my first year in college at S&T

# Survey Results

## Fall Retention Report

### Additional Student Comments:

- Some of the instructors were hard to understand (2)
- Diversify from Engineering
- Need a better variety of non-engineering classes
- Need classes that help determine what to major in
- Liked the name S&T better than Missouri S&T
- Curriculum felt difficult & fast paced
  - » Comp Sci Lead Session was good
  - » Math Lead Session talked over the students

# Survey Results

## Fall Retention Report

### Additional Student Comments:

- Need activities that encourage interaction between residents of the same floor. Dorm wide activities are too large in scope and it's almost impossible to make lasting friendships that way.
- The majority of people on campus are only interested in video games or drinking.
- Do more to curb underage drinking, especially at St. Pat's
- More student interest in athletics
- Improve student activities
- Improve food service

# Survey Results

## Fall Retention Report

### Summary of Other Survey Questions:

- Most students (+70%) did participate in some type of student activities
- Several students (+30%) said they would possibly return either to finish studies or for graduate studies
- Majority of the students (72%) did visit the campus before enrolling. Most found it to be very useful.
  - » Convinced one student that S&T was better than Colorado School of Mines
  - » Nice looking campus, grounds kept well.
  - » Tour didn't go to the quad
  - » Didn't feel it was representative of the campus

# Survey Results

## Fall Retention Report

### Interesting Observations:

- More students replied to emails than returned phone messages.
- There were more responses about being too focused on Engineering than about needing more females.
- Highly varied responses. One student will say that the faculty aren't helpful or enthusiastic when a number of them specifically say how great and helpful the faculty are.
- Overall students seemed very happy with S&T.

# QUESTIONS?

# Contact Information

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