

A Preliminary Sketch of the GSB Alumna

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This handout on the GSB Alumnae Survey (hereafter, the Survey) was prepared to inform discussion in a January 21, 1999 feedback session with alumnae at the GSB's Gleacher Center. An accompanying handout summarizes Survey responses.

DOWNLOADING REPORTS

The Survey provided a detailed description of women's careers. Reports on specific topics will be prepared in future months. As reports become available, they will be posted on the following webpage, from which you can download copies: <http://gsbwww.uchicago.edu/fac/ronald.burt/research>. This handout is GSBAS4 on the webpage (an image of the Survey questionnaire with response percentages is GSBAS3).

SURVEY RATIONALE

The central motivation for the Survey was a desire on the part of all constituencies to better understand life after the GSB. Practical benefits of the Survey included the possibility of discovering ways to improve the GSB for future alumnae, adding summary characteristics of alumnae careers to the evolving array of GSB management courses, getting back in touch with the alumnae, and contributing to the community of alumnae by improving their knowledge and awareness of one another. Research questions for the Survey concerned the timing and consequences of events and social networks in the careers of professional women. The Survey was an opportunity to bring GSB management research expertise to bear on an issue of practical and personal importance to the GSB.

Several people, upon hearing about the survey, asked "Why women?" Three reasons. The first and primary was academic: For the faculty conducting the Survey, there is more to learn from studying the careers of professional women because their careers involve a more, relative to men, varied set of barriers to success and a more complex mix of work and family obligations. There was also a practical reason: The alumnae are a smaller, and so more manageable, study population. The Survey was conducted on a shoestring budget. Random chance was also a factor: A window of opportunity opened with an inquiry I received from the Women's Business Group (a GSB alumnae club) to see if there was faculty interest in a survey of the GSB alumnae.

Alumnae Advise Women Entering the GSB

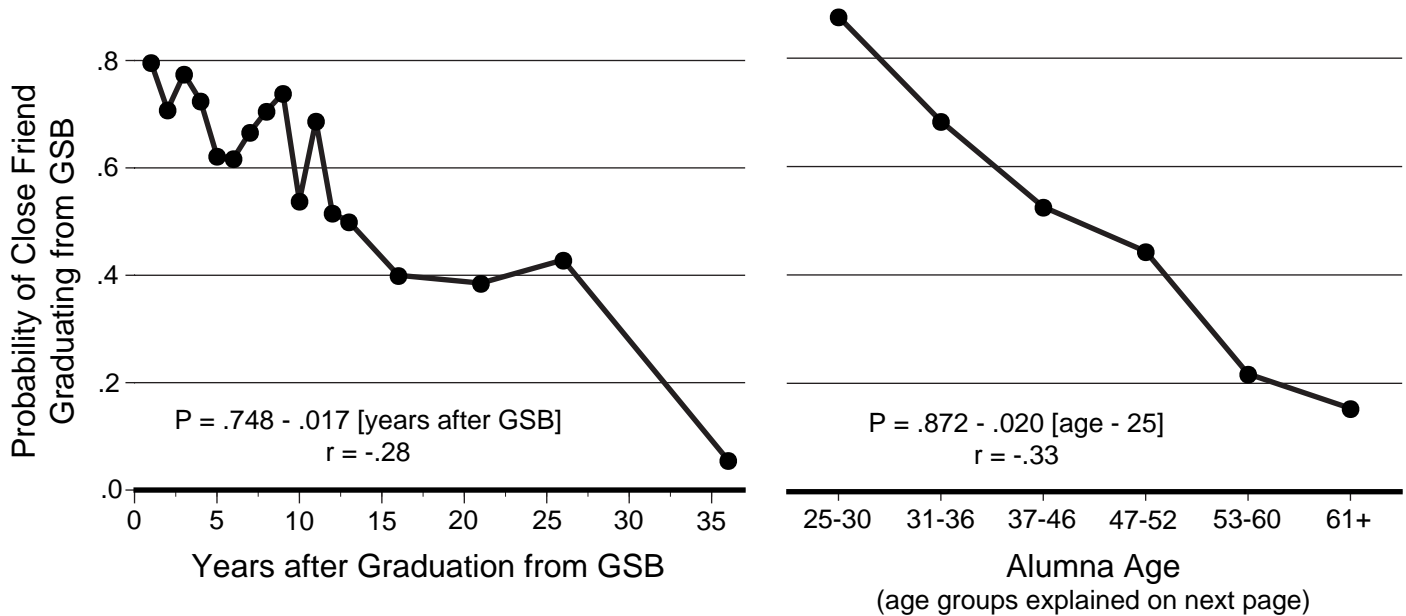
5. Imagine that you are talking to a friend's daughter who has been admitted to the GSB. You want to give the young woman the benefit of your experience so that she can make an informed choice about attending the GSB. Part B. What would you tell her to watch out for so that she could make better use of her time at the GSB?

Of the 811 respondents, 746 had advice on Part B. Frequent themes are criteria for selecting courses and finding the proper balance between GSB course work and other activities, especially building relations with other students for better learning and preparation for life after graduation. One in five alumnae offering advice (a total of 142 women) focused on the importance of building relationships with other students in preparation for life after graduation. Here are selected quotes, most from alumnae who have reached senior positions or started their own businesses:

- Don't focus so intensively on academic aspects that she fails to make the personal connections that can broaden and enrich her experiences at the GSB, and after the GSB.
- Get to know as many and varied classmates as you can. Move beyond your most familiar or comfortable circles to appreciate the diverse talents, goals, and backgrounds of people at the GSB.
- If she's committed to achieving a senior management position, take every opportunity to network.
- The relationships you develop will actually be as, if not more, important than the course work.
- Become involved with a wide range of social groups, rather than joining a clique.
- Make contacts. Keep them.
- Spend more time getting to know classmates better, and make a concerted effort after graduation to keep in touch.
- Don't get hung up only on the classroom experience. Join clubs, socialize, attend events, and begin your networking effects immediately.
- As a 190 student, my primary motivation was to finish. I did not take enough time to really get to know my many fellow students.
- Time goes very quickly; move right into networking, and toward identifying what your job search interview goals are.
- Don't study only the subject matter. Study the professors and fellow students; they have a lot to offer.
- Beware of insulation/isolation. If you're working and attending classes, take time to develop friendships.
- The limited opportunities for networking are a detriment to the value of her MBA. She will have to make her own opportunities for networking.

GSB Friendships and Time

21. Do you count any GSB graduates among your close friends? If yes, name the one or two with whom you are most close.



Factors Affecting Prob(GSB Friend)	Range of Scores on Factor	Probability Change with Unit Increase in Factor (OLS)	Logit t-test	Logit Coefficient
Constant		1.34		4.53
Years after graduation	4 to 16	-.02	-5.8	-.10
Age at graduation	26 to 31	-.02	-4.3	-.11
Graduated before 1977	0, 1	.21	2.8	1.02
XP program	0, 1	.26	2.6	1.31
LEAD program	0, 1	.16	3.4	.83
Years in the GSB	2 to 3	-.03	-2.0	-.20
Nonredundant Contacts	6.7 to 11.3	.02	4.8	.12
Ever Married	0, 1	-.07	-1.9	-.41
Senior Manager	0, 1	.11	2.8	.57
Value "Wide Network"	1 to 5	.05	3.3	.26

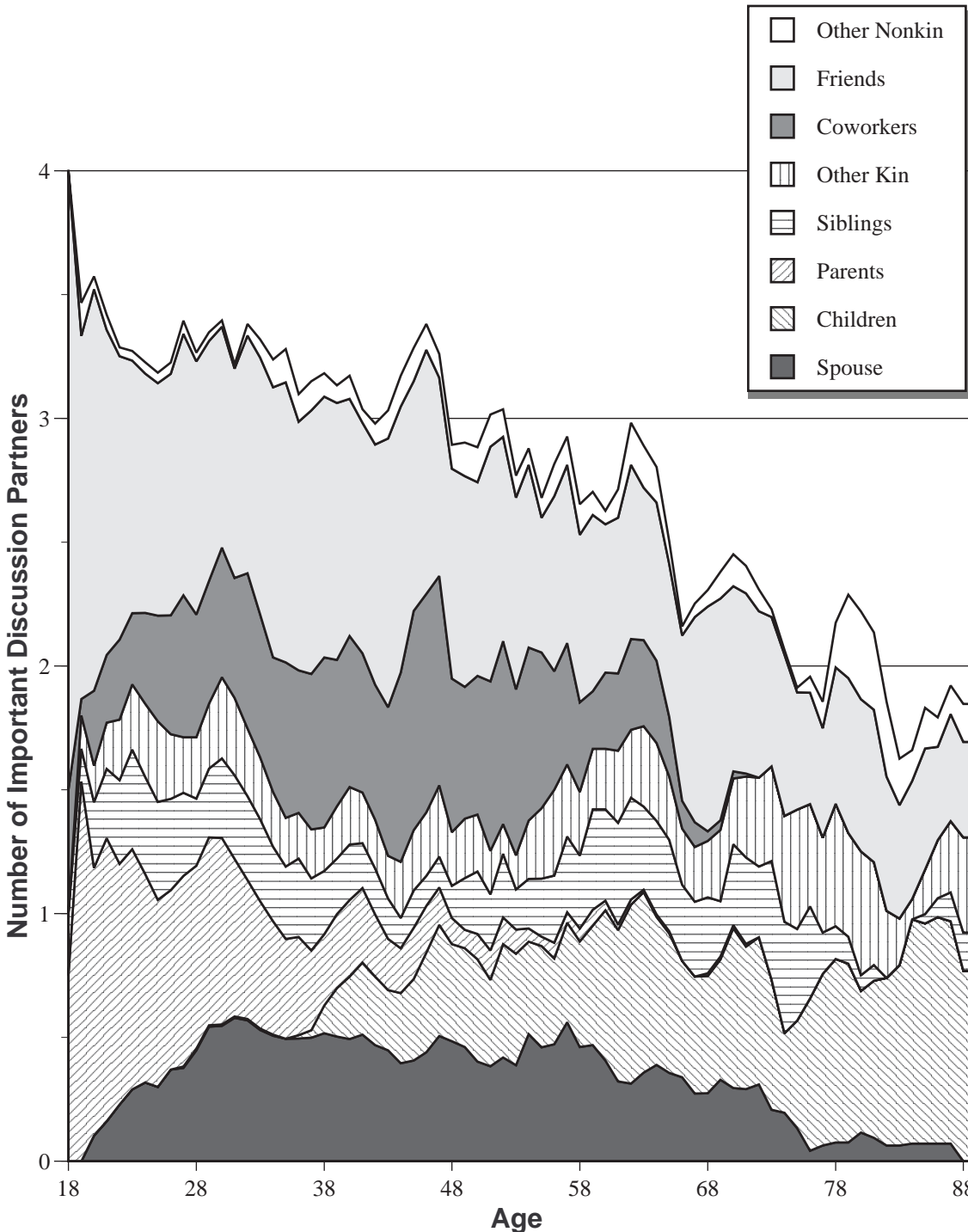
Note — Effects were estimated across the 791 alumnae for whom all factors were known. Range of scores are minimum to maximum, except for the following which are 25th percentile to 75th percentile: years after graduation, age at graduation, years in the GSB, nonredundant contacts. Other factors were tested that had no effect beyond the above factors — household composition (Q7), time spent on household chores (Q8, Q9, Q10), time spent taking care of children (Q11), family income (Q12), marriages and divorces (Q13, except ever married), number of children (Q13), labor-market status (Q14 and Q16, except senior rank), and personal values (Q6, Q36, Q37, Q38, Q39, Q40, see pages 18ff of this handout) with the exception of putting a high value on a "wide network of relationships" (Q36 item O).

Biological Age and Social Age

AGE IN 1998	BIRTH DATES	AMERICAN WOMEN	GSB ALUMNA	AGE STATUS	CHARACTERISTIC IMPORTANT DISCUSSION RELATIONS
Under 19	After 1979	0	0	I Children	minors (not included in national probability surveys)
19 - 24	1974-1979	10.3%	0	II College	large networks; frequent contact with parents, and age-homophilous close & casual friends
25 - 30	1968-1973	15.4%	8.6%	III Young Adults	fewer daily contacts; continuing age-homophilous friends; spouses and coworkers enter
31 - 36	1962-1967	12.2%	26.4%	IV Twilight Youth	parents decline; last period of concentrated age-homophilous relations (other than spouse) until old age
37 - 46	1952-1961	17.4%	43.2%	V Middle-Age	daily contact begins continuing steep decline; children a concentrated focus of relations; children begin to replace parents and siblings; coworkers prominent; minimum age homophily in relations with relatives, spouse, and contacts beyond family
47 - 52	1946-1951	7.9%	13.3%	VI Older Adults	continue changes begun in middle-age; transition to less differentiation between especially close & less close relations
53 - 60	1938-1945	10.5%	5.5%	VII Senior Adults	parents disappear; coworkers decline
61 - 66	1932-1937	7.7%	0.7%	VIII Retiring Adults	coworkers disappear; concentrated age-homophilous relations reappear with relatives and contacts beyond the family
Over 66	Before 1932	18.7%	2.3%	IX Retired Adults	small networks; declining friends beyond family, high proportion kin; equally close to all important discussion partners; declining friends beyond family

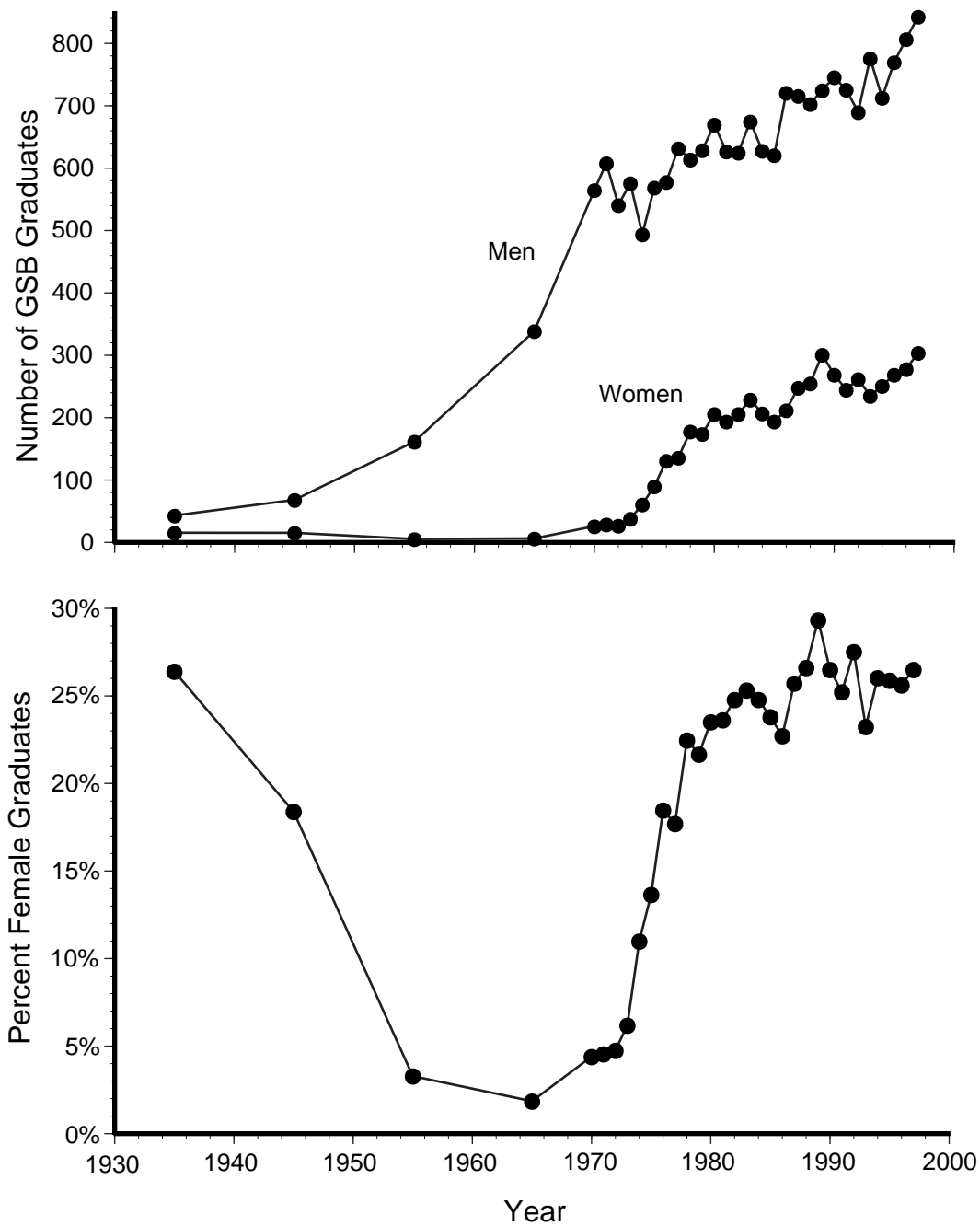
NOTE — Age statuses are taken from a network analysis of a national probability sample of Americans (Burt, "Measuring age as a structural concept," *Social Networks*, 1991: Table 1). "American Women" are the 839 women in the probability sample of Americans (all women, all levels of education). "GSB Alumna" are the 1,058 women who returned either of the two survey questionnaires.

Different Kinds of Contacts Are Important Discussion Partners over the Life-Cycle



NOTE — Taken from network analysis of a national probability sample of Americans (Burt, "Measuring age as a structural concept," *Social Networks*, 1991: Figure 2).

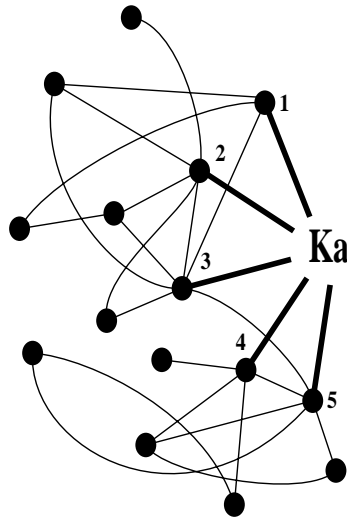
Variations in the the GSB Experience



Variations that sometimes matter:

- Graduated before 1977 — distinguishes alumnae who graduated before 1977
- XP program — graduated from the XP program
- Downtown program — graduated from one of the downtown programs
- Campus program — graduated from one of the campus programs
- LEAD program — participated in LEAD program
- Years in the GSB — years between entry and graduation from the GSB

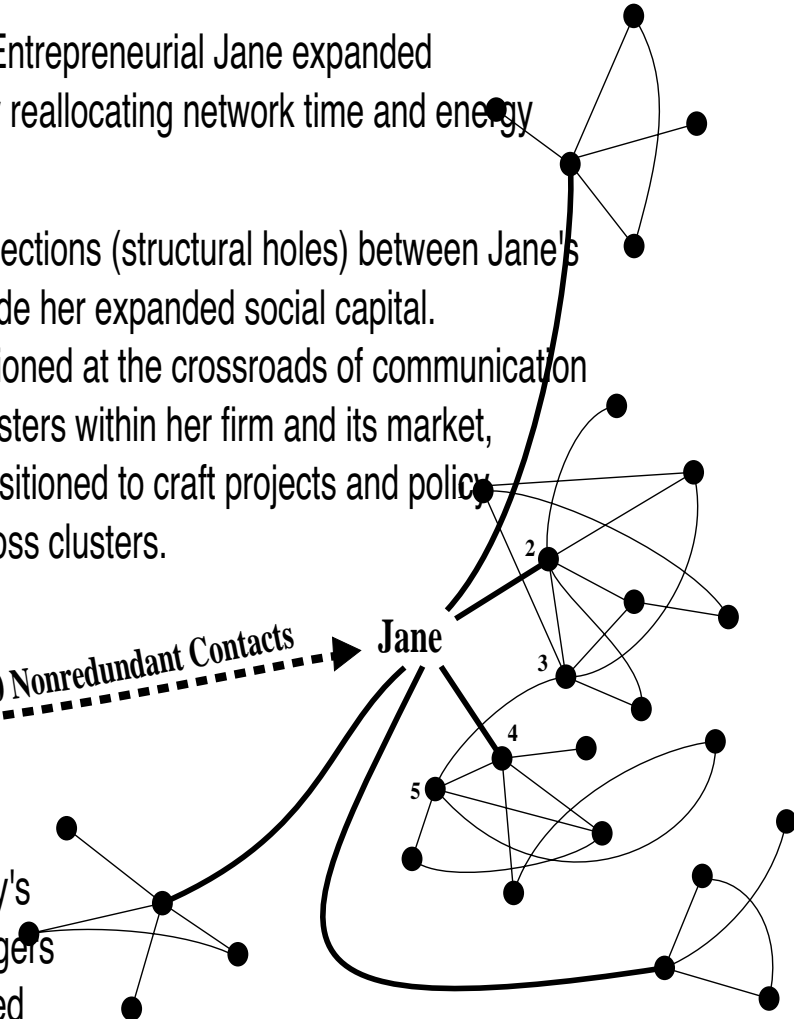
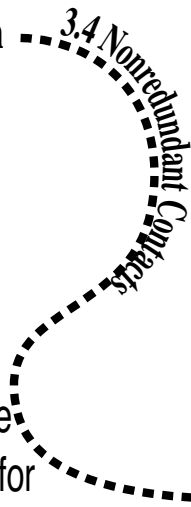
Alumna Social Capital in Theory



Jane took over Karen's job. Entrepreneurial Jane expanded the social capital of the job by reallocating network time and energy to more diverse contacts.

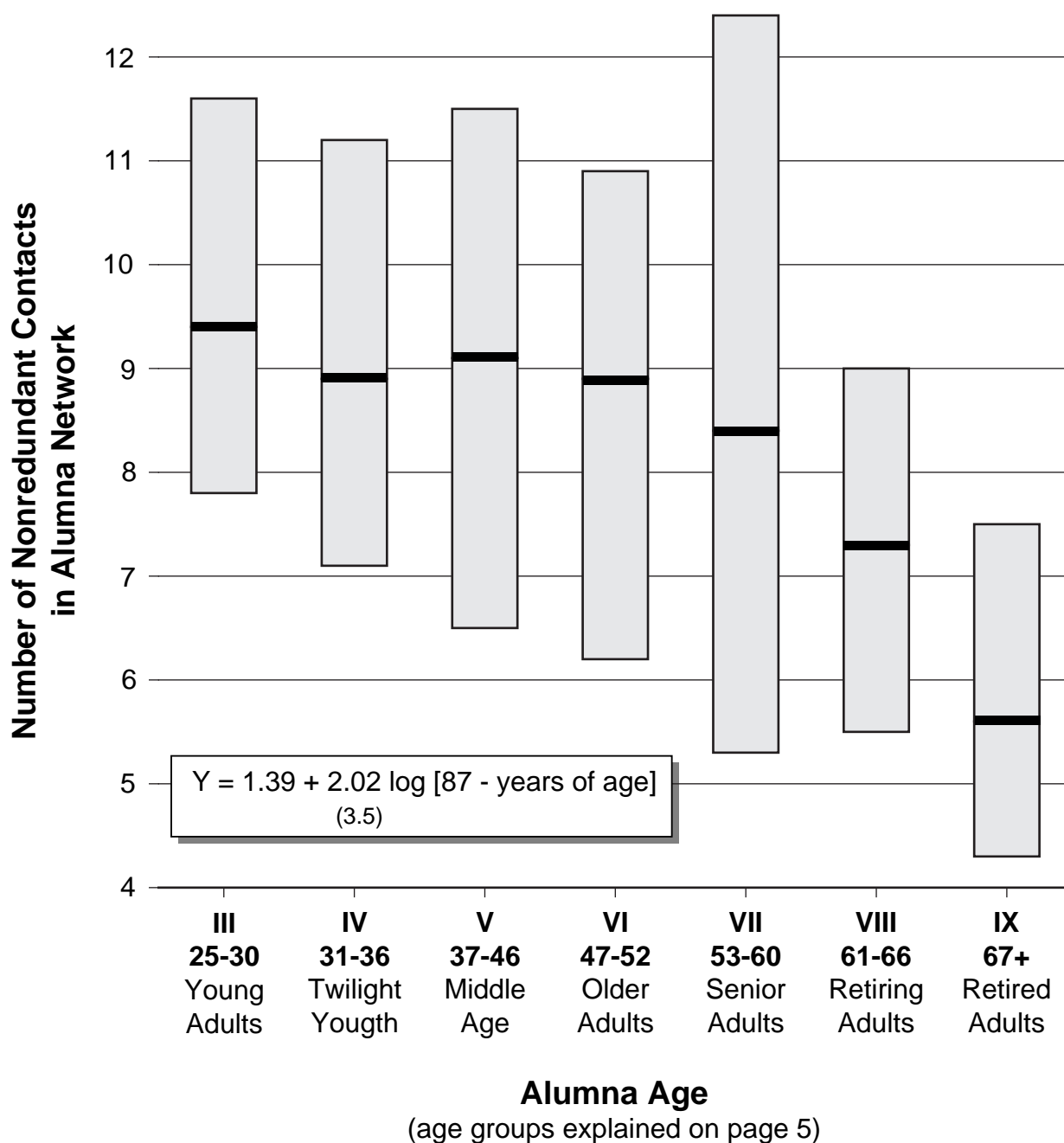
It is the weak connections (structural holes) between Jane's contacts that provide her expanded social capital. Jane is more positioned at the crossroads of communication between social clusters within her firm and its market, and so is better positioned to craft projects and policies that add value across clusters.

Research shows that people like Jane, better positioned for entrepreneurial opportunity, are the key to integrating across functions and across the people of increasingly diverse backgrounds in today's flatter organizations. In research comparisons between managers like Karen and Jane, it is the people like Jane who get promoted faster, earn higher compensation, receive better performance evaluations, and perform more successfully on teams.

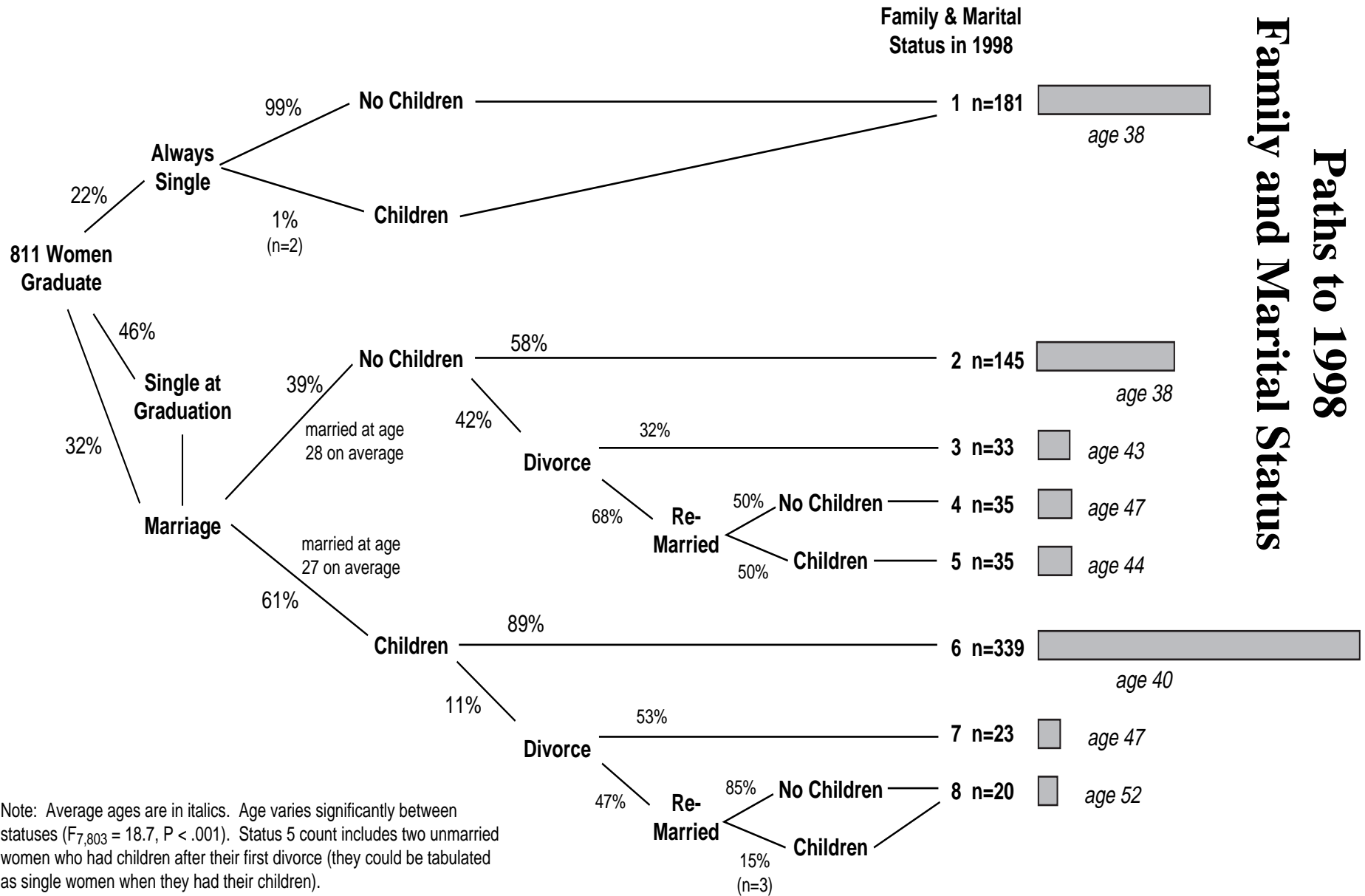


Alumna Social Capital over the Life-Cycle

Bar over each age status ranges from 25th percentile of nonredundant contacts (bottom of bar), to median (dark band in middle), up to 75th percentile (top of bar).
Expected decline with age is statistically significant (OLS t-test 3.5, 789 d.f., $P < .001$).

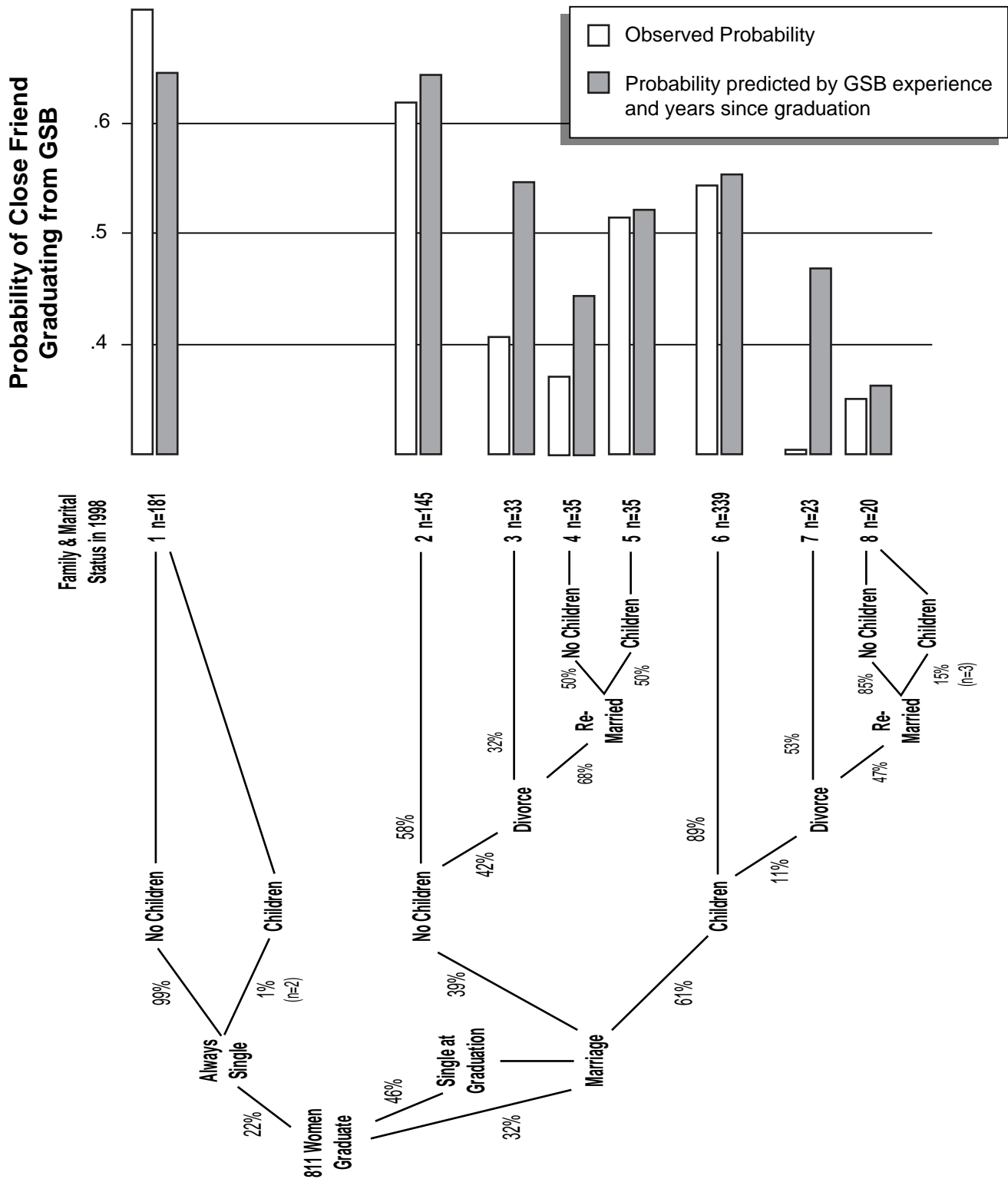


Paths to 1998 Family and Marital Status

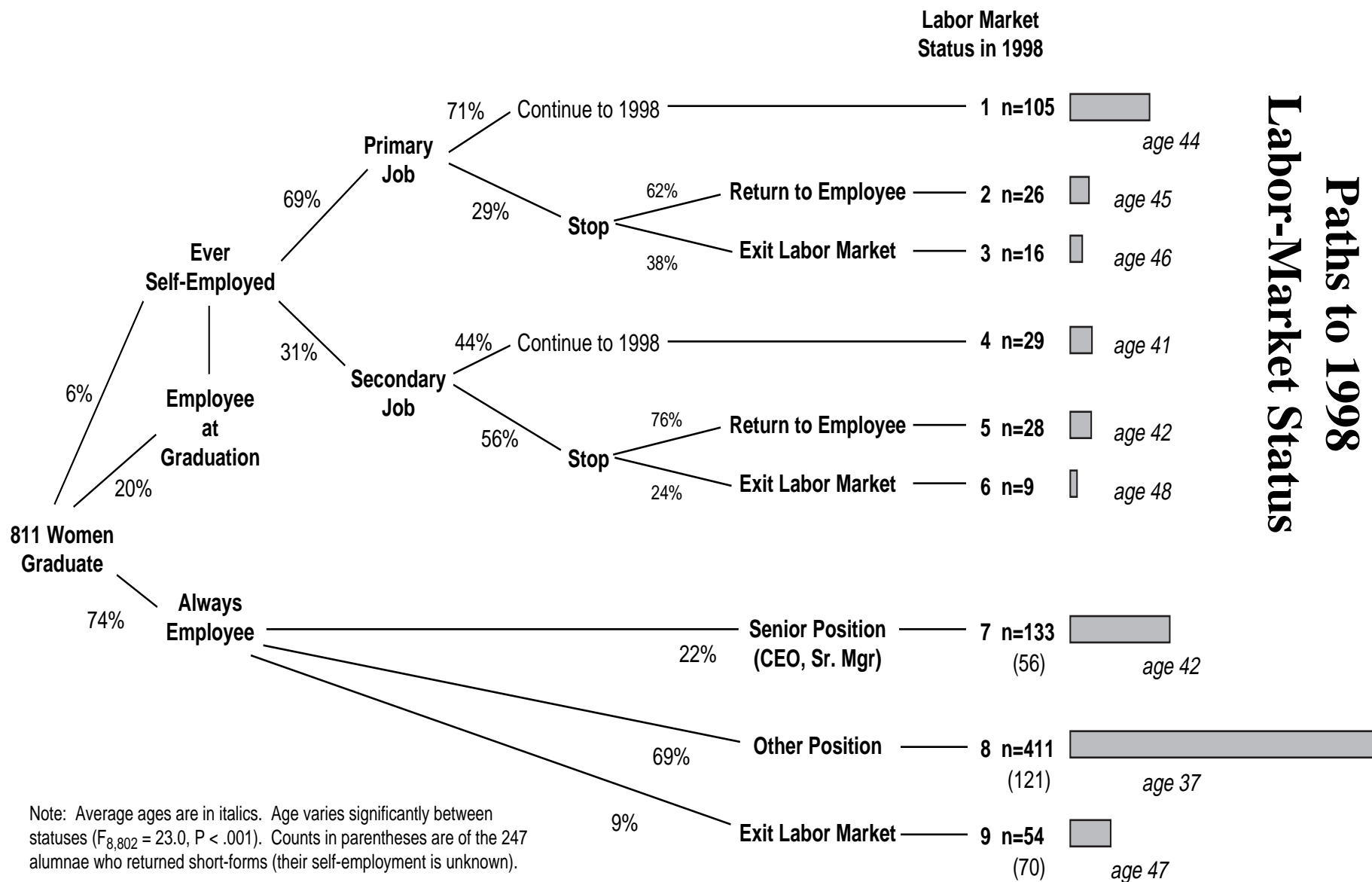


GSB Friendships by Family and Marital Status in 1998

(probability of GSB friendship varies significantly, 31.5 chi-square statistic with 7 d.f., $P < .001$)



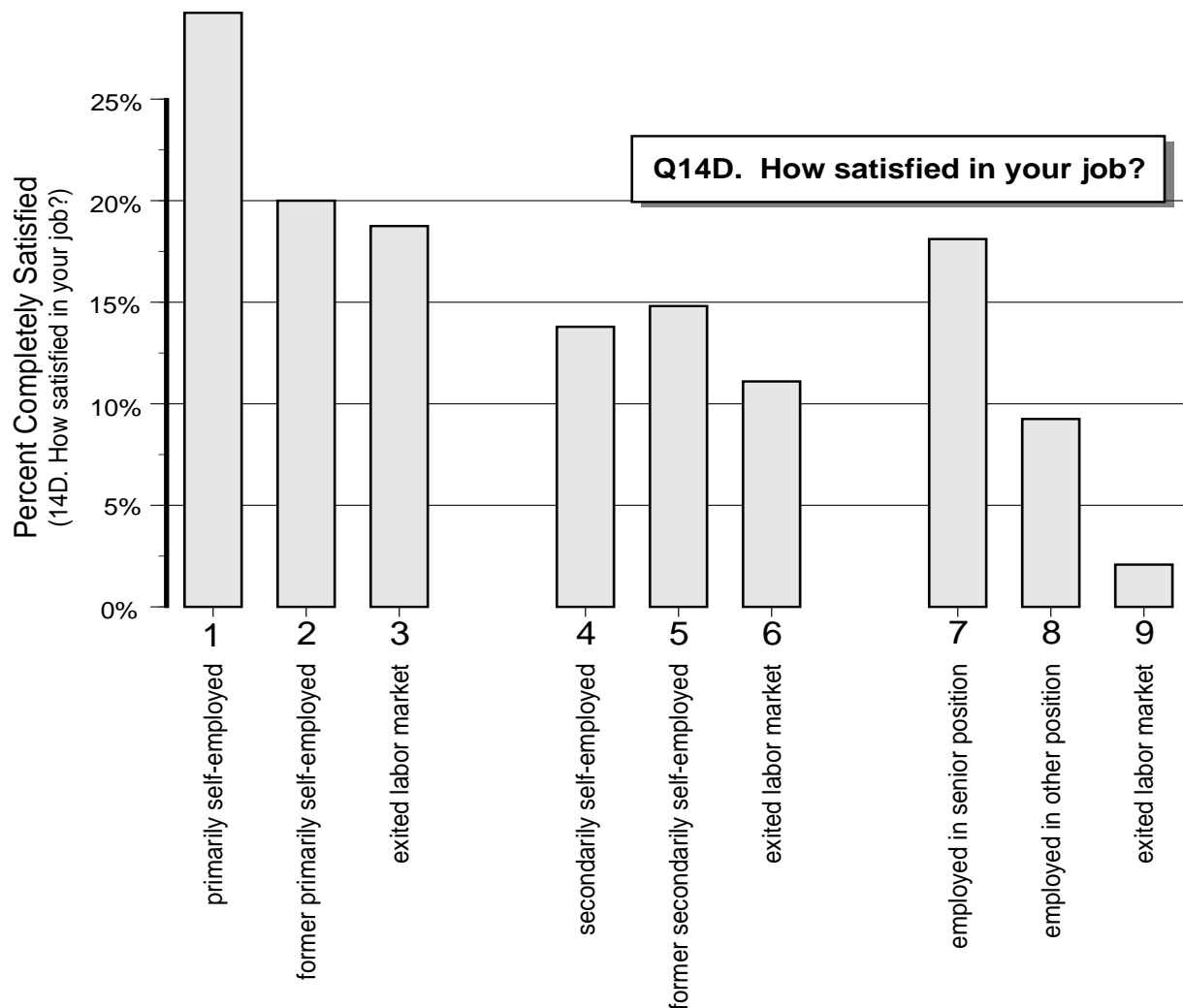
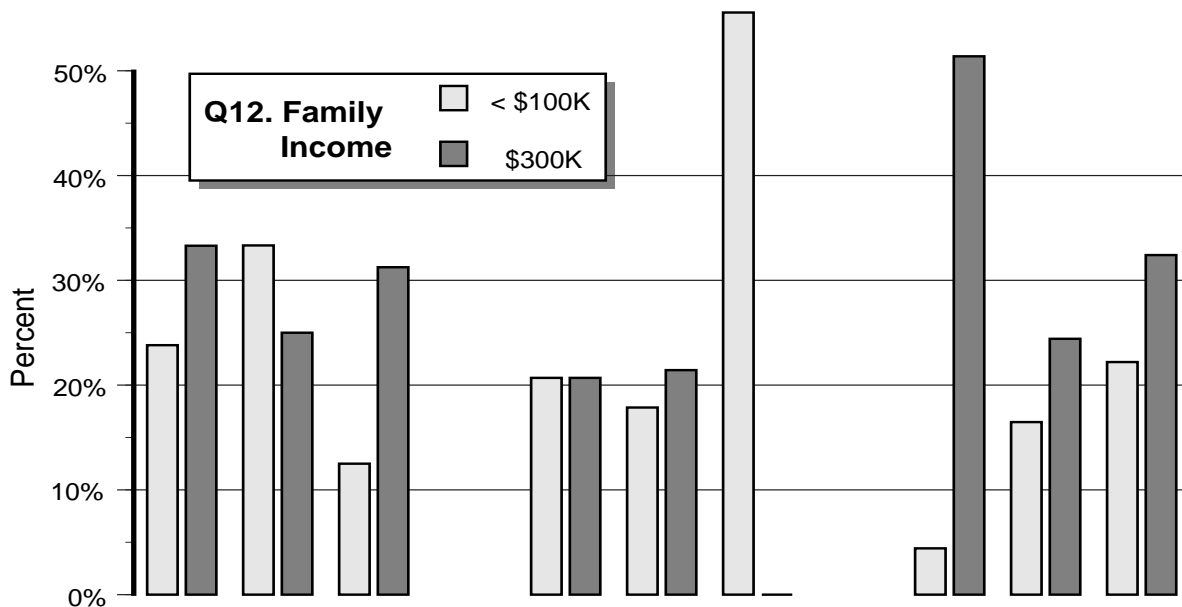
Paths to 1998 Labor-Market Status



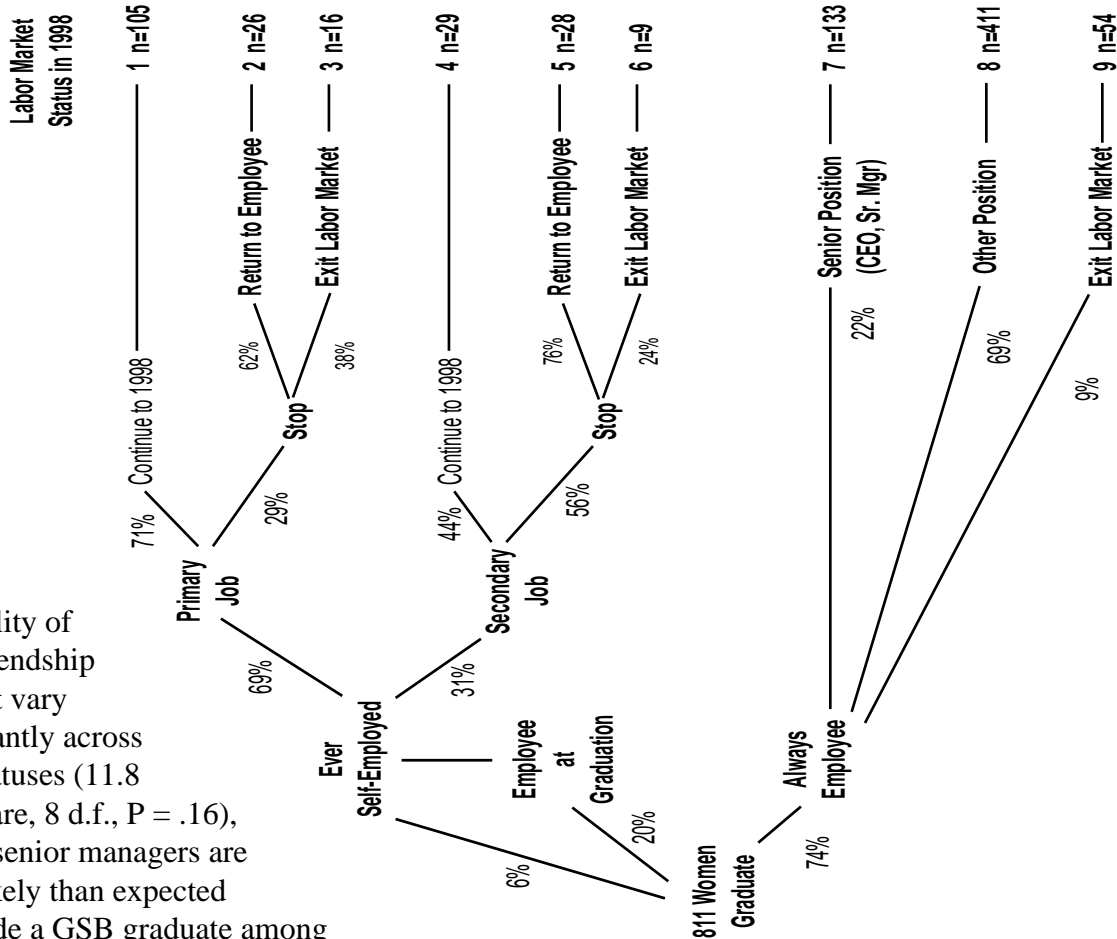
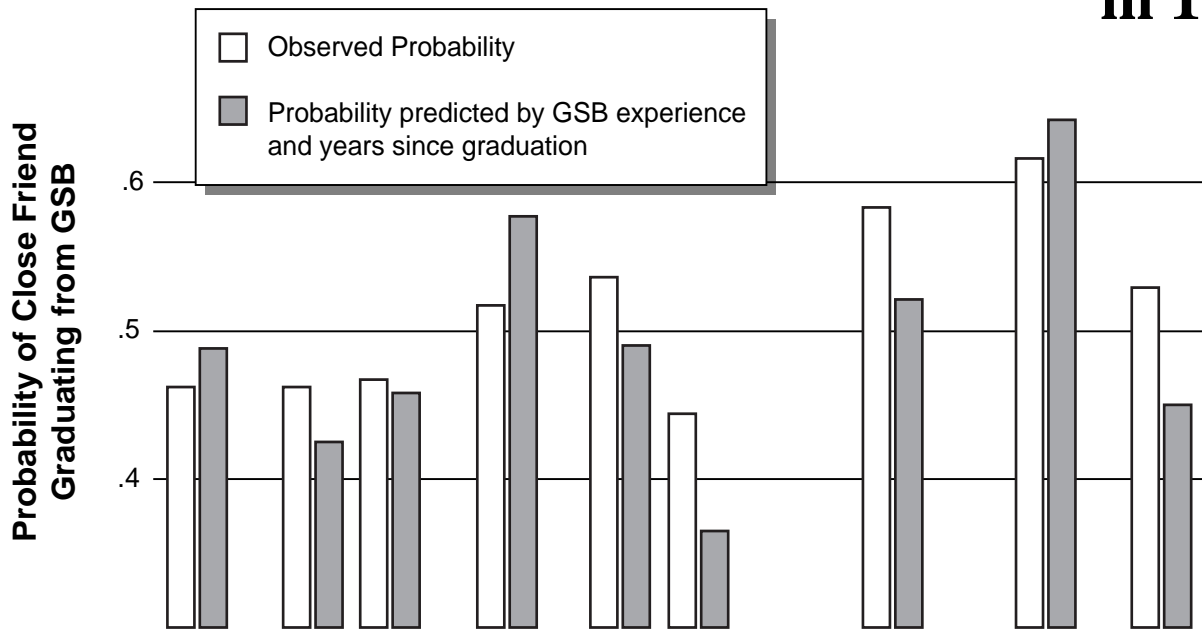
Note: Average ages are in italics. Age varies significantly between statuses ($F_{8,802} = 23.0, P < .001$). Counts in parentheses are of the 247 alumnae who returned short-forms (their self-employment is unknown).

Family Income and Job Satisfaction by Labor-Market Status

(chi-square statistics: 83.5 with 16 d.f. for family income, 35.8 with 8 d.f. for job satisfaction, $P < .001$)



GSB Friendships by Labor-Market Status in 1998

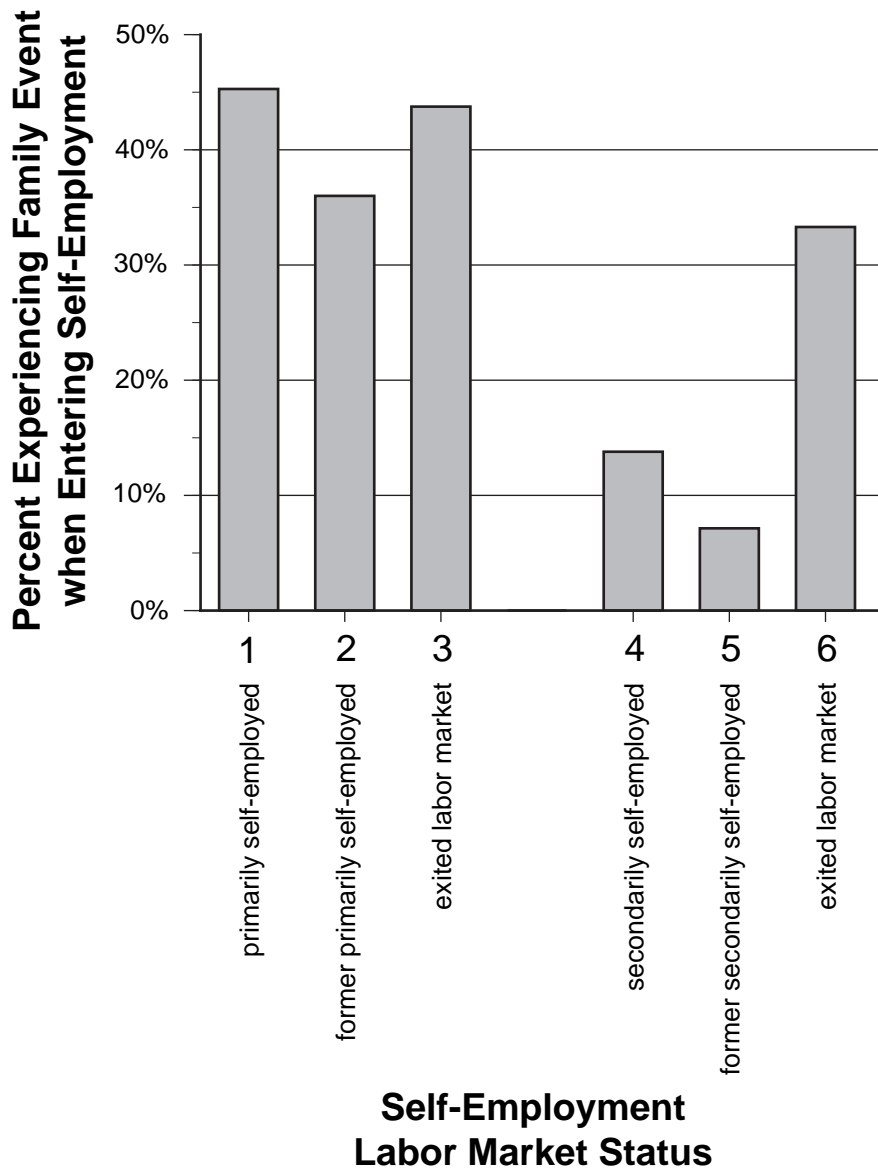


Probability of GSB friendship does not vary significantly across the 9 statuses (11.8 chi-square, 8 d.f., $P = .16$), though senior managers are more likely than expected to include a GSB graduate among their close friends (status 7, see page 4). The

visible tendency for exiting alumnae to have GSB friends is not statistically significant (logit t-test of 1.88 for tendency in statuses 2, 3, 5, 6, and 9; 1.80 for tendency in statuses 3, 6, and 9).

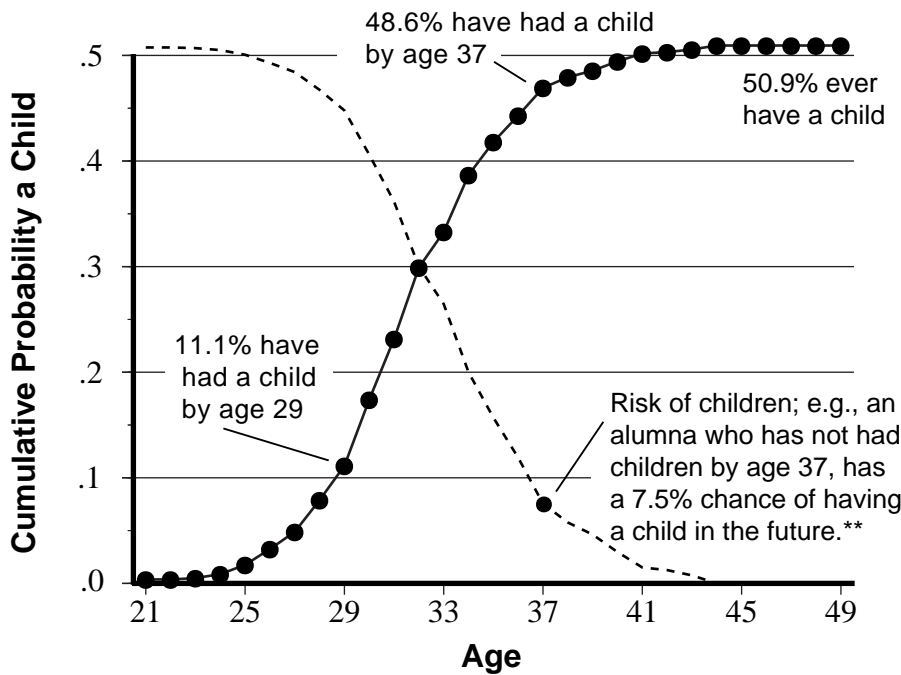
Family Events Are Associated with Alumnae Entering Self-Employment

(family events are marriages, divorces, or children born in the year, or year just before, entering self-employment; 24.1 chi-square statistic with 5 d.f., $P < .001$)



(career paths to these statuses given on page 12)

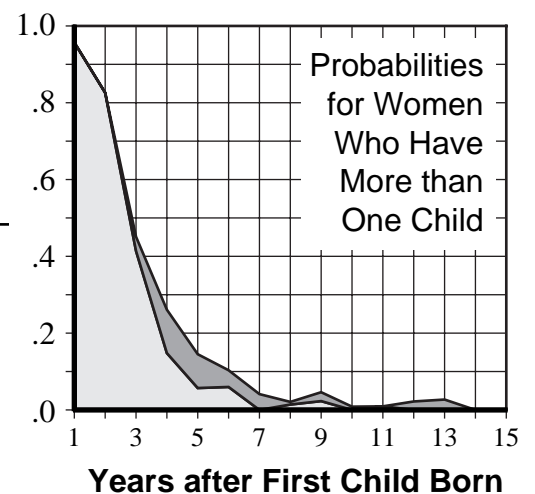
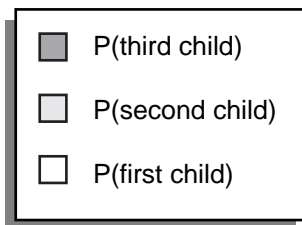
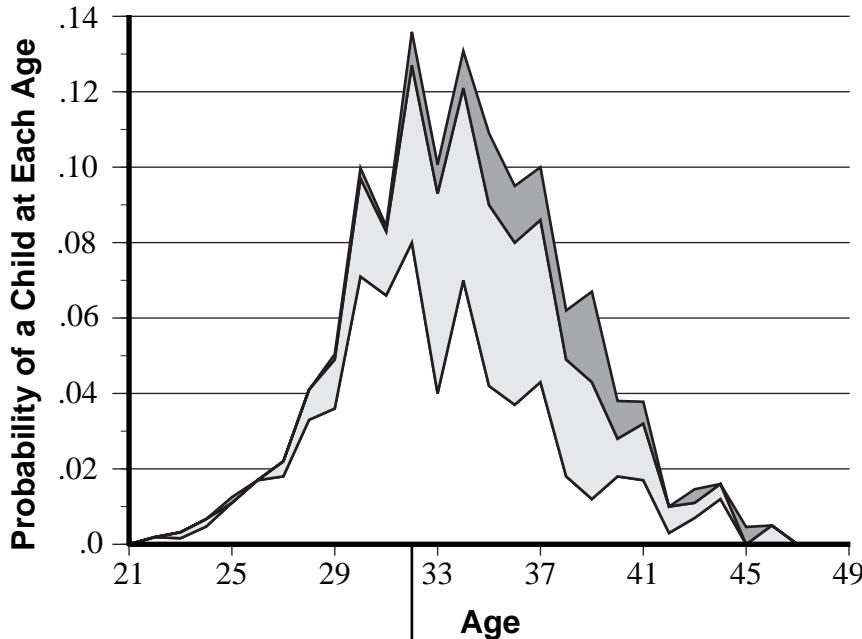
Illustrative Dynamics of Family Events, I. Timing and Clustering Children



A. Half of the alumna (51%) have had children by age 49.*

B. Births spread over a wide range of ages (early 20s to early 40s),

C. though the births for any one alumna are clustered together (second birth especially likely within a year or two of first birth).



Notes — *The percentage is actually 52%. There are 12 alumnae who reported having children, but not dates of birth. **Ceteris paribus, the risk of a woman at age t having a first child in the future is $(nw - nt)/(n - nt)$, where n is the total number of women, nt is the number who have had children by age t , and nw is the number who will have children.

Illustrative Dynamics of Family Events,

II. Patterns of Marriage & Divorce



A. Four fifths (77%) of the alumnae are or have been married, of whom 23% have been divorced.

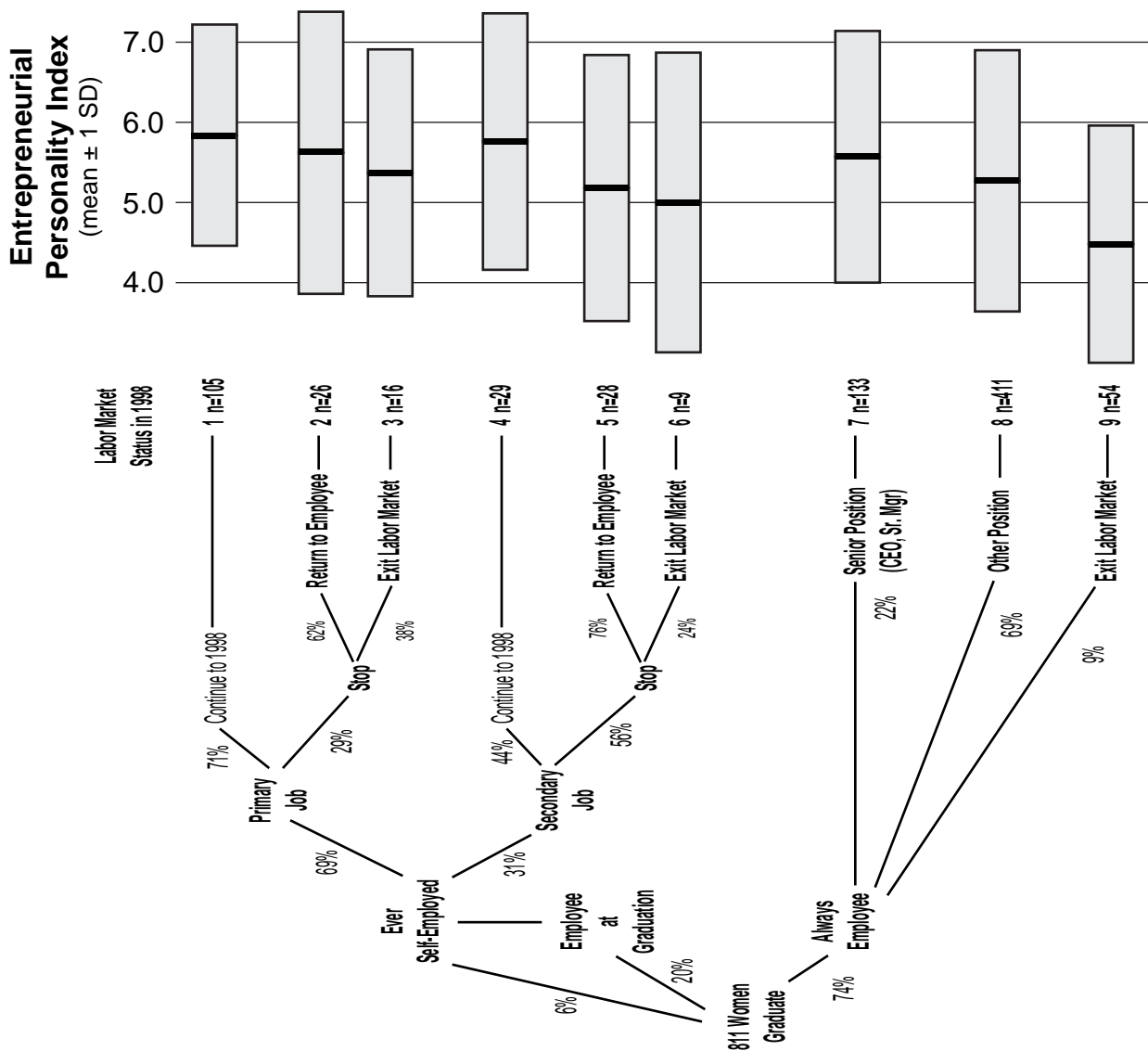
B. First marriages are concentrated in the 20s and early 30s, but new marriages are frequent into the 40s.

C. The risk of divorce is highest in years 4-7 for alumna with no children in first marriage; years 12 and on for those with children in their first marriage.



Entrepreneurial Style of Work Is More Evident among Actively Self-Employed Alumnae and Alumnae in Senior Positions

Entrepreneurial Personality Index varies from 0 (for persons whose style of work involves getting along with others, and a preference for security and stability) up to 10 (style of work involves feeling like an outsider, and a preference for authority, advocacy, and change).



Q37 contains the Index items on the Survey questionnaire (for further details, see Burt, Jannotta, and Mahoney, "Personality correlates of structural holes," *Social Networks*, 1998; copy available on my webpage). The higher Index scores among actively self-employed alumnae and those in senior positions is statistically significant (2.4 t-test, $P = .02$). The Index is not associated with age ($F_{1,792} = 0.40$, $P = .53$), and does not vary significantly with family and marital status (page 10; $F_{7,792} = 1.55$, $P = .15$).

Barriers to Success by Their Significance on Average for Alumnae Careers

**Alumnae Actively Self-Employed
(n = 132; statuses 1, 4 on page 12):**

**Alumnae in Senior Positions
(n = 131; status 7 on page 12):**

**Alumnae No Longer in the Labor Market
(n = 75; statuses 3, 6, and 9 on page 12):**

3.41	B. Exclusion from informal networks	3.29	D. Few women with senior experience	3.68	N. Family responsibilities
3.20	M. Counterproductive colleague behavior	3.26	B. Exclusion from informal networks	3.63	H. Conflicting personal versus prof. values
3.20	H. Conflicting personal versus prof. values	3.21	J. Career demands	3.45	J. Career demands
3.17	J. Career demands	3.05	M. Counterproductive colleague behavior	3.31	B. Exclusion from informal networks
3.13	N. Family responsibilities	2.90	K. Lack of suitable senior manager sponsors	3.21	I. Rigid corporate bureaucracy
3.13	D. Few women with senior experience	2.86	N. Family responsibilities	3.03	M. Counterproductive colleague behavior
3.12	K. Lack of suitable senior manager sponsors	2.81	F. Corporate climate alienates/isolates	3.03	K. Lack of suitable senior manager sponsors
3.08	F. Corporate climate alienates/isolates	2.74	A. Lack of promotion opportunities	3.00	F. Corporate climate alienates/isolates
3.04	A. Lack of promotion opportunities	2.66	H. Conflicting personal versus prof. values	2.95	A. Lack of promotion opportunities
2.96	I. Rigid corporate bureaucracy	2.60	I. Rigid corporate bureaucracy	2.89	D. Few women with senior experience
2.51	E. Lack of management training/rotation	2.56	C. Geographic mobility to other cities	2.60	O. Biased evaluation practices
2.48	C. Geographic mobility to other cities	2.41	P. Initial job placement/clustering of women	2.55	C. Geographic mobility to other cities
2.48	O. Biased evaluation practices	2.34	O. Biased evaluation practices	2.36	E. Lack of management training/rotation
2.36	L. Low-visibility work assignments	2.27	G. Inadequate outreach/recruitment	2.29	L. Low-visibility work assignments
2.32	P. Initial job placement/clustering of women	2.21	E. Lack of management training/rotation	2.23	P. Initial job placement/clustering of women
2.30	G. Inadequate outreach/recruitment	2.16	L. Low-visibility work assignments	2.16	G. Inadequate outreach/recruitment

Note — Sixteen kinds of barriers to success for women are listed in order of their rated relevance to the alumnae. Each row within a column group is the mean rating of a barrier on a scale of 1 to 5, the alphabetical sequence of the item from A to P, and the substance of the barrier (see Q38 for original wording). Mean ratings are correlated .88 between the alumnae actively self-employed (column one) and those in senior positions (column two), with respective correlations of .89 and .70 with the mean ratings of the alumnae no longer in the labor market (column three). Mean ratings by alumnae not in this table (those once actively self-employed and those in less than senior positions, statuses 2, 5, and 8 on page 12) are correlated .92, .85, and .73 respectively with the three columns of mean ratings in the table.

Dimensions of Success by Their Importance on Average to the Alumnae

Alumnae Actively Self-Employed
(n = 134; statuses 1, 4 on page 12):

Alumnae in Senior Positions
(n = 132; status 7 on page 12):

Alumnae No Longer in the Labor Market
(n = 77; statuses 3, 6, and 9 on page 12):

4.70	B. Personal happiness	4.69	B. Personal happiness	4.77	B. Personal happiness
4.59	K. Having control of your life	4.54	L. Financial independence	4.48	K. Having control of your life
4.44	L. Financial independence	4.43	K. Having control of your life	4.17	E. Success and happiness of your children
4.10	I. Living an authentic life	4.12	M. Making things happen	4.09	I. Living an authentic life
4.04	M. Making things happen	4.04	I. Living an authentic life	4.05	L. Financial independence
4.01	G. Number of lives changed for the better	3.98	A. Compensation	3.92	G. Number of lives changed for the better
3.64	N. Security	3.89	N. Security	3.90	N. Security
3.61	A. Compensation	3.83	D. Recognition by peers	3.58	M. Making things happen
3.43	E. Success and happiness of your children	3.69	G. Number of lives changed for the better	3.31	D. Recognition by peers
3.31	D. Recognition by peers	3.50	P. Leading change	3.26	A. Compensation
3.22	P. Leading change	3.42	E. Success and happiness of your children	2.73	J. Material possessions
3.16	O. Wide network of relationships	3.33	F. Recognition by comp., community, media	2.70	P. Leading change
2.87	J. Material possessions	3.05	J. Material possessions	2.70	F. Recognition by comp., community, media
2.75	F. Recognition by comp., community, media	2.93	C. Direct reports & sphere of influence	2.69	O. Wide network of relationships
2.44	H. "Winning the game"	2.89	O. Wide network of relationships	1.93	C. Direct reports & sphere of influence
2.12	C. Direct reports & sphere of influence	2.80	H. "Winning the game"	1.91	H. "Winning the game"

Note — Sixteen dimensions of success are listed in order of the importance alumnae gave them. Each row within a column group is the mean rating of a dimension on a scale of 1 to 5, the alphabetical sequence of the item from A to P, and the substance of the dimension (see Q36 for original wording). Mean ratings are correlated .92 between the alumnae actively self-employed (column one) and those in senior positions (column two), with respective correlations of .93 and .86 with the mean ratings of the alumnae no longer in the labor market (column three). Mean ratings by alumnae not in this table (those once actively self-employed and those in less than senior positions, statuses 2, 5, and 8 on page 12) are correlated .95, .95, and .93 respectively with the three columns of mean ratings in the table.

Definitions of Success Vary Dramatically Between Individuals

There are no underlying factors that summarize the success dimensions.

The first five principal components of the ratings describe 16.2%, 12.4%, 10.1%, 8.0%, and 6.6% of variance in the 16 dimensions (would be 6.2% if the 16 dimensions were completely independent), and routine statistical inference leads to almost as many underlying factors as observed dimensions (e.g., the statistical program STATA stops at a 10-factor model but rejects even that model as grossly incomplete; 10,414 chi-square, 5 d.f., $P < .00001$).

What it means to be successful varies systematically with alumna age, network, family, and position in the labor market.

Compensation (Q36A) and children's careers (Q36E) are more important to older alumnae. Sphere of influence (Q36C), recognition by peers (Q36D), and having a wide network of relationships (Q36O) are more important to alumnae with more social capital (many nonredundant contacts). Most alumnae do not associate success with "a wide network of relationships" (see item O on the previous page), but an alumna for whom "a wide network" is very important is significantly more likely to have a GSB friend above and beyond what is typical for her age, her family, and her position in the labor market (page 4).

Family and marital status are also associated with the importance of compensation (Q36A), children's careers (Q36E), and having a "wide network of relationships" (Q36O). Married women in particular emphasize the first two dimensions. Single women emphasize the third.

Labor-market status is associated with variation in all of the success dimensions, except two that are random across all tested predictors (Q36I "living an authentic life," Q36J "material possessions"), and a third very important to almost all alumnae (Q36K "having control of your life"). The above associations are statistically significant well beyond the .001 level of confidence ($F_{16,791} = 3.11$ for age; $F_{16,774} = 3.61$ for nonredundant contacts, $F_{112,5084} = 4.84$ for family and marital status, and $F_{128,5666} = 2.57$ for labor-market status).

In fact, there are almost as many definitions of success as there are alumnae.

Simplify the ratings to a simple yes or no; a dimension is either very important to an alumna (rating 5 or 4) or it is not (ratings 3, 2, 1). For example, 98.5% of the alumnae rate "personal happiness" as very important (Q36B), while only 19.7% rate "winning the game" as very important (Q36H). Each alumna's definition of success can be expressed as a profile of binary scores in which certain of the 16 dimensions are rated very important.

If each alumna rated the same dimensions very important, there would be one GSB definition of success shared by all alumnae. Instead, the 808 alumnae produced 605 different definitions of success!*

*The probability of different definitions of success from n alumnae is analogous to the classic birthday problem in probability (probability of same birthday for two or more of n people in a room). Flip an unbiased coin 16 times to produce one random definition of success (e.g., heads for very important dimensions). There are 65,536 different definitions possible. There is a low (.06) probability of 605 different definitions of success in as many draws from the large number of definitions possible. The probability would be higher for 808 draws, but the noteworthy point is that the definitions of success are so diverse as to be even remotely similar to the predictions of random chance.