

EFFECTIVENESS OF A PEER GROUP INTERVENTION



FOR HEALTH WORKERS AND RURAL ADULTS AND ADOLESCENTS IN MALAWI

A collaborative partnership of



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Where is Malawi?



Malawi



Purpose



- To describe the outcomes of the *Mzake ndi Mzake* peer group intervention on the HIV-prevention related knowledge, attitudes and behaviors of:
 - Rural Health Workers
 - Urban Health Workers
 - Rural Adults
 - Rural Youth

Mzake ndi Mzake: Health Workers – A Potential Resource for HIV Prevention



- Health workers are already present throughout the country, including rural areas
- People know and trust health workers for health-related information
- Health workers are often close to community members
- Health workers are sensitized to the impact of AIDS



RURAL HEALTH WORKERS

Mzake ndi Mzake: The Intervention



- The *Mzake ndi Mzake* peer group intervention
 - Semi-structured small group meetings facilitated by trained peer group leaders
 - Health workers and community members volunteered to be leaders and received intensive training
 - 6 general sessions on HIV and AIDS, sexuality, condom use, partner negotiation and community prevention
 - 4 additional sessions just for health workers on AIDS treatment, universal precautions, teaching clients and ethical issues

Mzake ndi Mzake: Conceptual Frameworks



Primary Health Care

- Community, health system & university collaborate
- Peer leaders

Social-Cognitive Learning Theory

- Content
- Instructional modalities

Contextual Tailoring

- Gender inequality
- Culturally sensitive topics

Mzake ndi Mzake Peer Group Intervention for HIV Prevention

Mzake ndi Mzake: Mobilizing Health Workers for HIV Prevention in Malawi



- Rural intervention introduced in four steps:
 - Mobilizing rural district hospital health workers
 - Mobilizing rural clinic workers, community leaders
 - Providing peer education for community adults
 - Developing and implementing peer education for rural young people (or adolescents)
- Urban hospital workers received the intervention with supplemental funds from the World AIDS Foundation

Mzake ndi Mzake: Research Design



Sequential mixed methods design

- Phase I Qualitative – Tailoring the intervention
 - Used focus groups and interviews (previously presented)
 - Developed four new sessions for health workers
- Phase II Quasi-experiment – Testing the intervention
 - Comparable districts randomly assigned to intervention and delayed intervention control group
 - Baseline, midterm and final evaluation of independent random samples
 - For urban health workers at a large hospital, used a pretest / post-test design with no control group

Mzake ndi Mzake: Intervention Fidelity



- Observers rated leaders' facilitation behaviors and group process for randomly selected sessions
- There were significant increases over Sessions 1 to 6 in:
 - Peer leader facilitation skills
 - Group member engagement
 - Group rated as “like a peer group” rather than “like a classroom”
 - Peer leaders covered material completely and accurately
- Trained health worker and community adult volunteers can be effective peer group leaders





Acknowledgements



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- We would like to thank the many officials, university administrators, health workers and community members who have generously offered their time and support.



Lake Malawi in the warm heart of Africa

IMPACT OF A PEER-GROUP INTERVENTION ON RURAL HEALTH WORKERS' HIV PREVENTION IN MALAWI



Rural Health Workers (HWs):



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Rural HWs: Purpose



- To examine the impact of *Mzake ndi Mzake* peer group intervention at rural district hospitals and health centers on
 - Health workers' personal HIV related knowledge, attitudes and behaviors
 - Health workers' use of universal precautions and client teaching

Rural HWs: Method



- Project staff facilitated the first health worker groups that trained district hospital workers
- Hospital workers then volunteered and received training to be peer group facilitators for other HWs and community adults
- **243 health workers** at all levels participated



UIC COLLEGE OF
UNIVERSITY OF ILLINOIS AT CHICAGO NURSING

A Participating District Hospital

Rural HWs: Demographics



- Type of Job
 - 37% were Clinicians/Technicians
 - 52% were Clinical Support Staff
 - 10% were Non-Clinical Staff
- Gender: 43% male
- Age: 52% over 50 years of age
- Education: Over 40% finished secondary school



A Participating Rural Health Centre

Rural HWs: Evaluation Design



- We interviewed and observed independent random samples in the intervention and control districts
- There were no significant differences between the intervention and control groups at baseline
- Therefore, this presentation omits baseline data
- The midterm evaluation occurred 8 months after the intervention
- The final evaluation occurred 28 months after the intervention

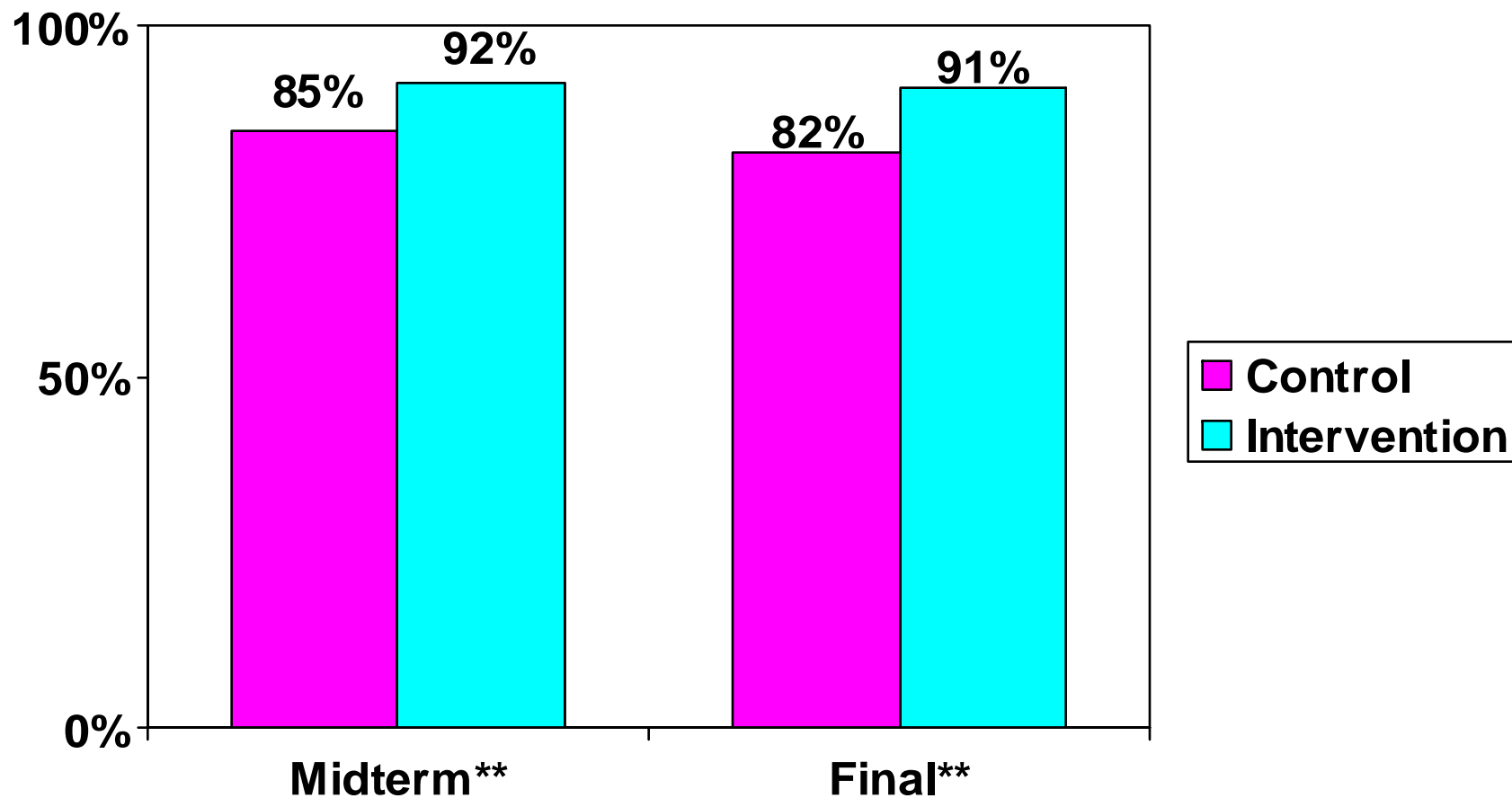
Rural HWs: Sample Size



	Midterm Interview	Midterm Observation	Final Interview	Final Observation
Control	93	90	203	286
Intervention	99	106	221	412
Total	192	196	421	698

Rural HWs: AIDS Knowledge Score

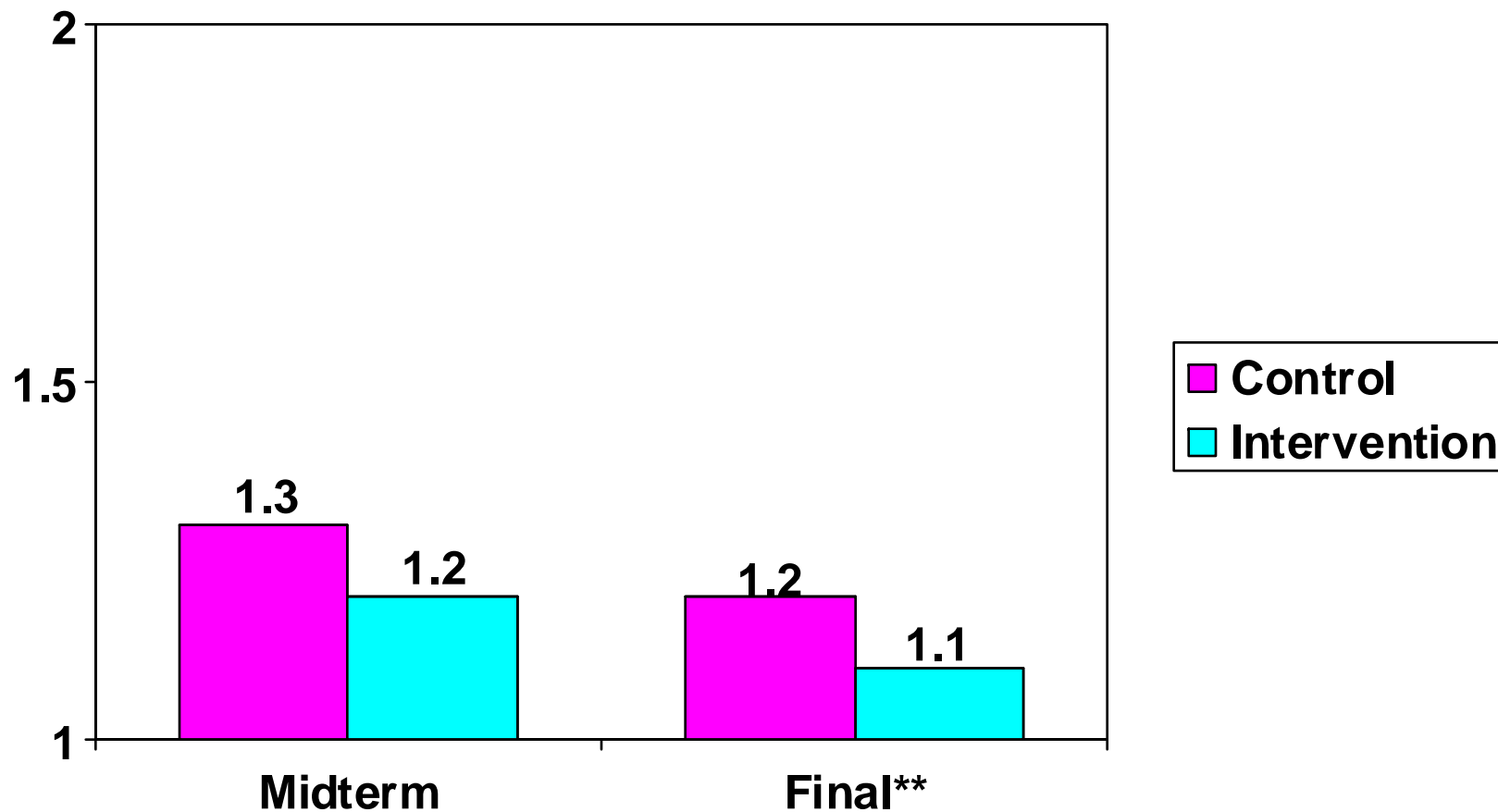
(6 items, % correct)



**p<.01

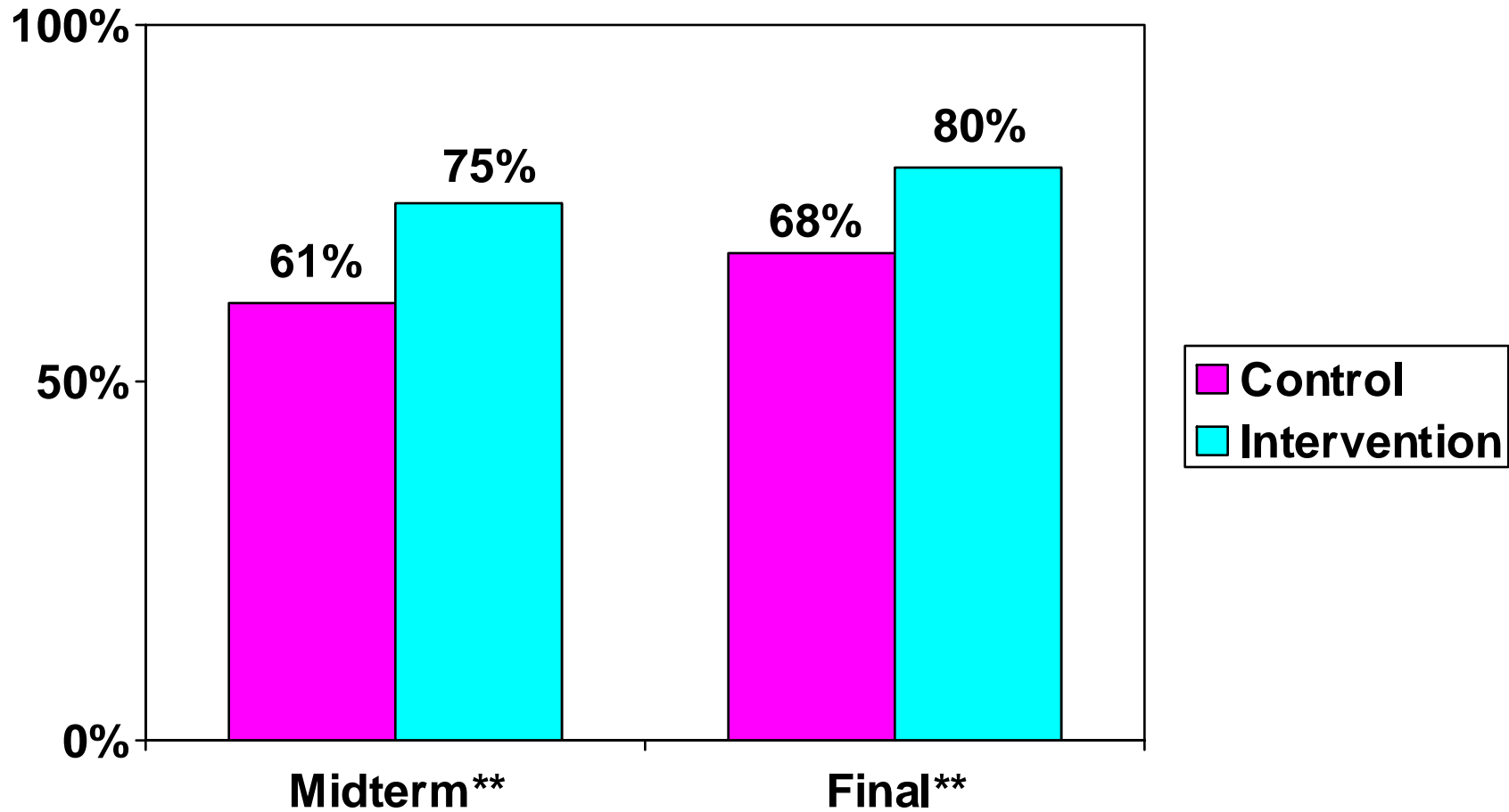
Rural HWs: Blame Person with HIV

(Single item, 1=no, 2=not sure, 3=yes)



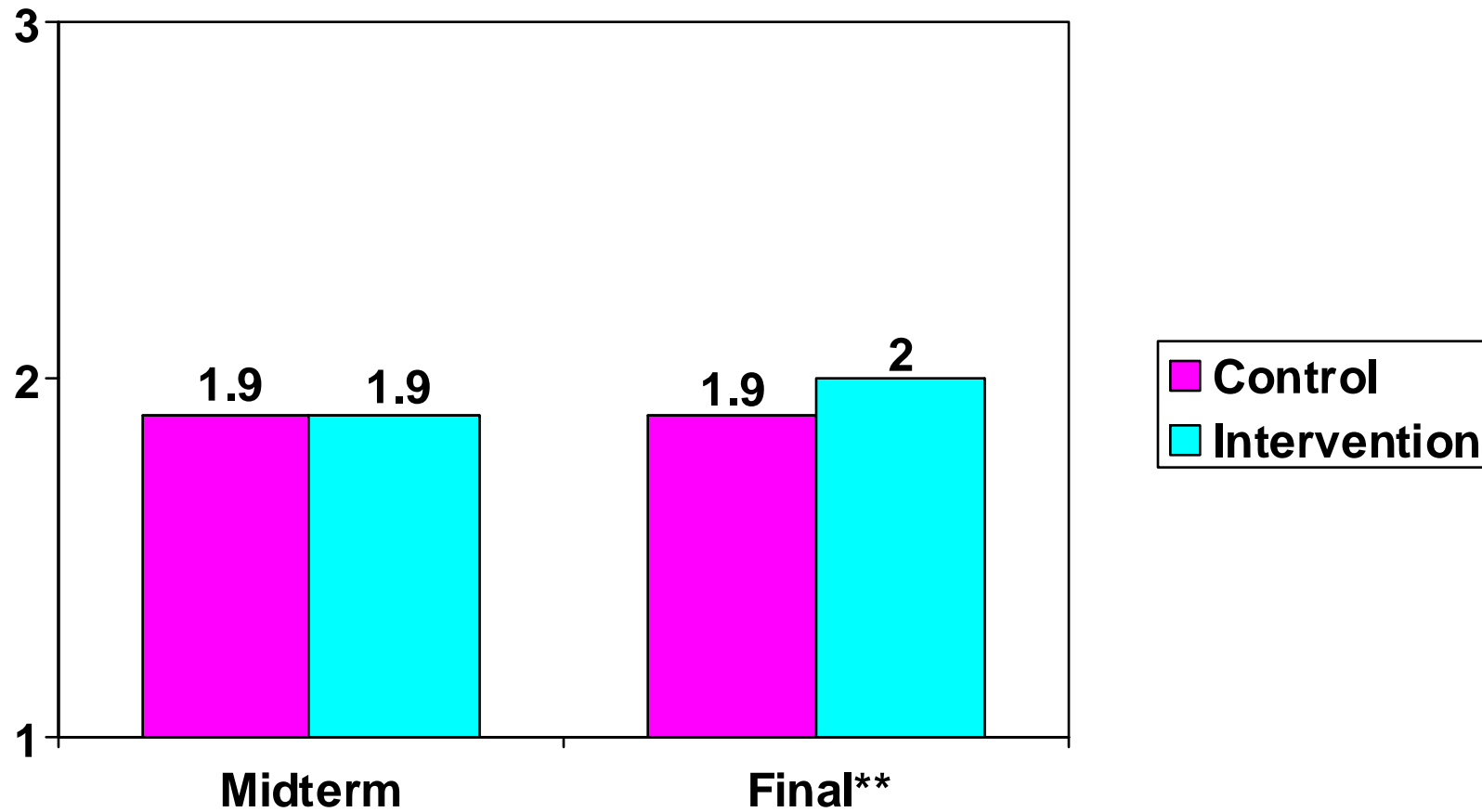
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Rural HWs: Condom Attitudes (10 items, % answered positively)



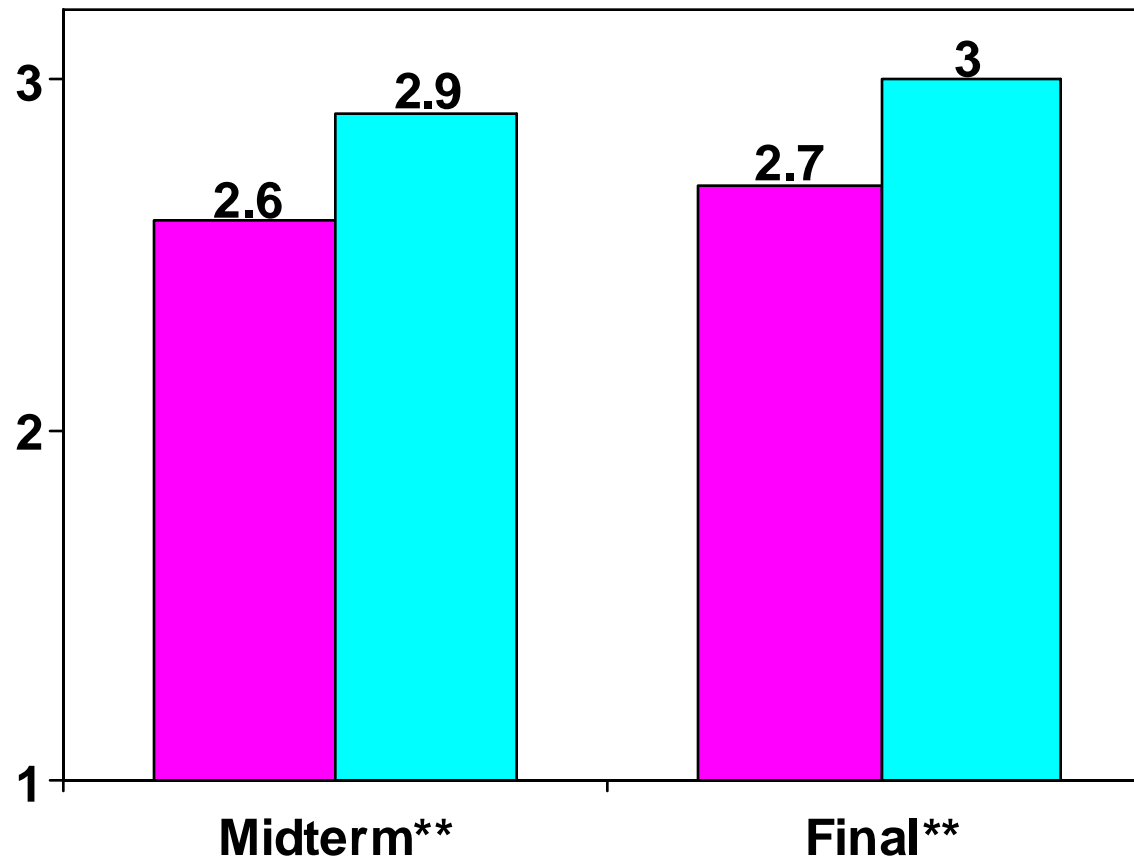
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Rural HWs: Attitude Toward HIV Testing (2 items, range 1-3, 3=most positive)



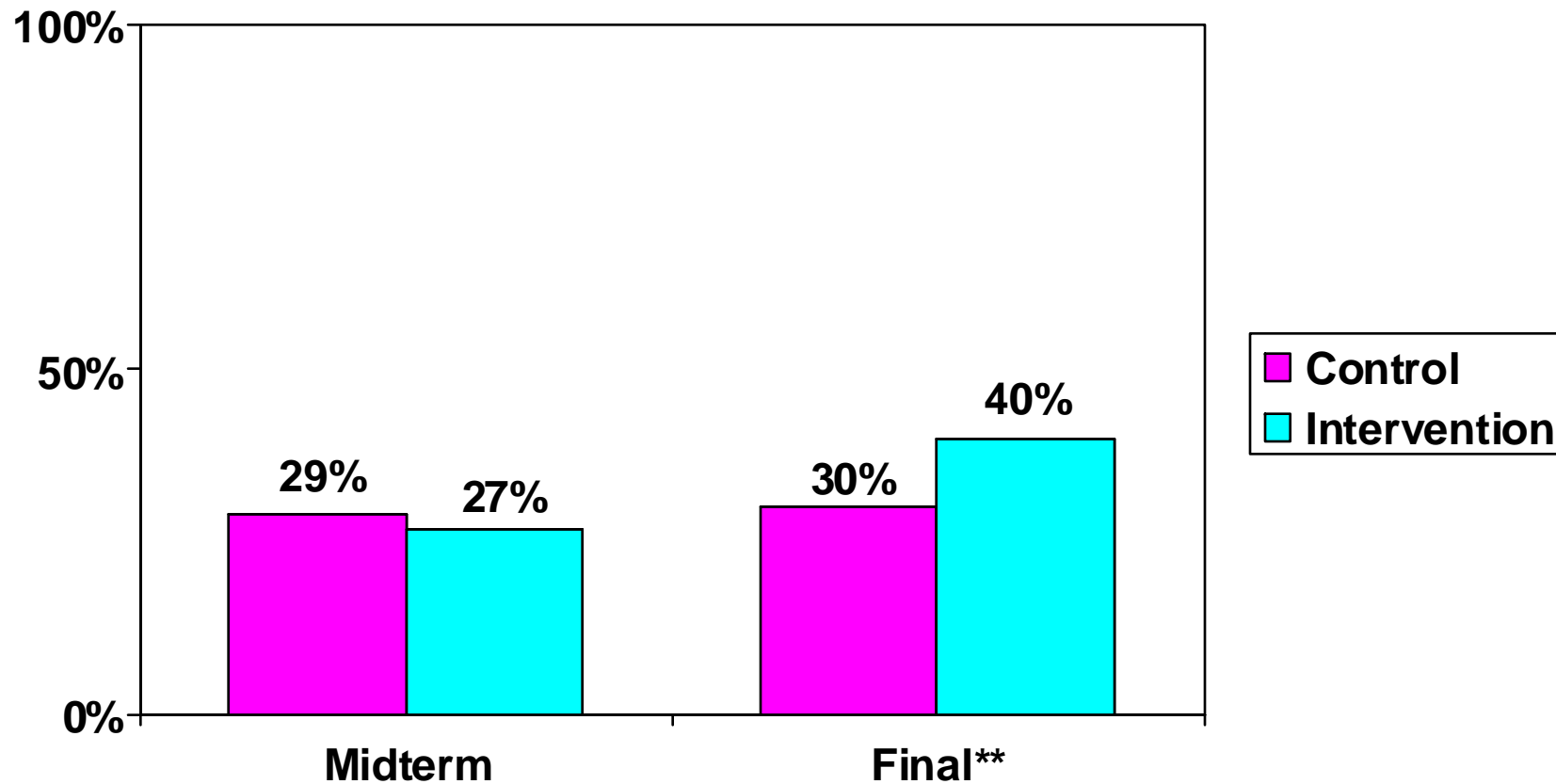
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Rural HWs: Self-Efficacy for Safer Sex (6-items, range 1-3, 3= very confident)



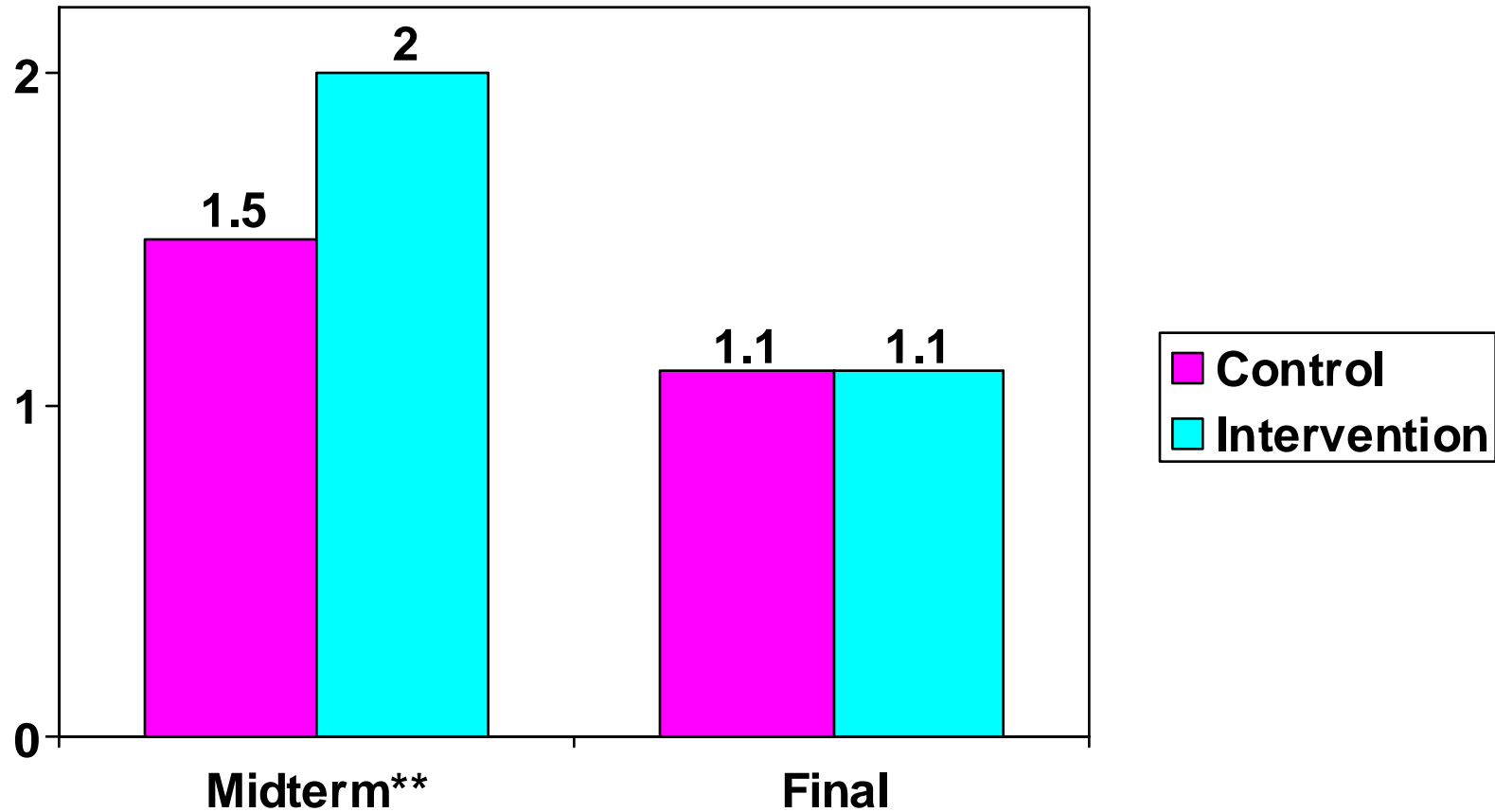
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Rural HWs: HIV Test in Last Year (% reported having test)



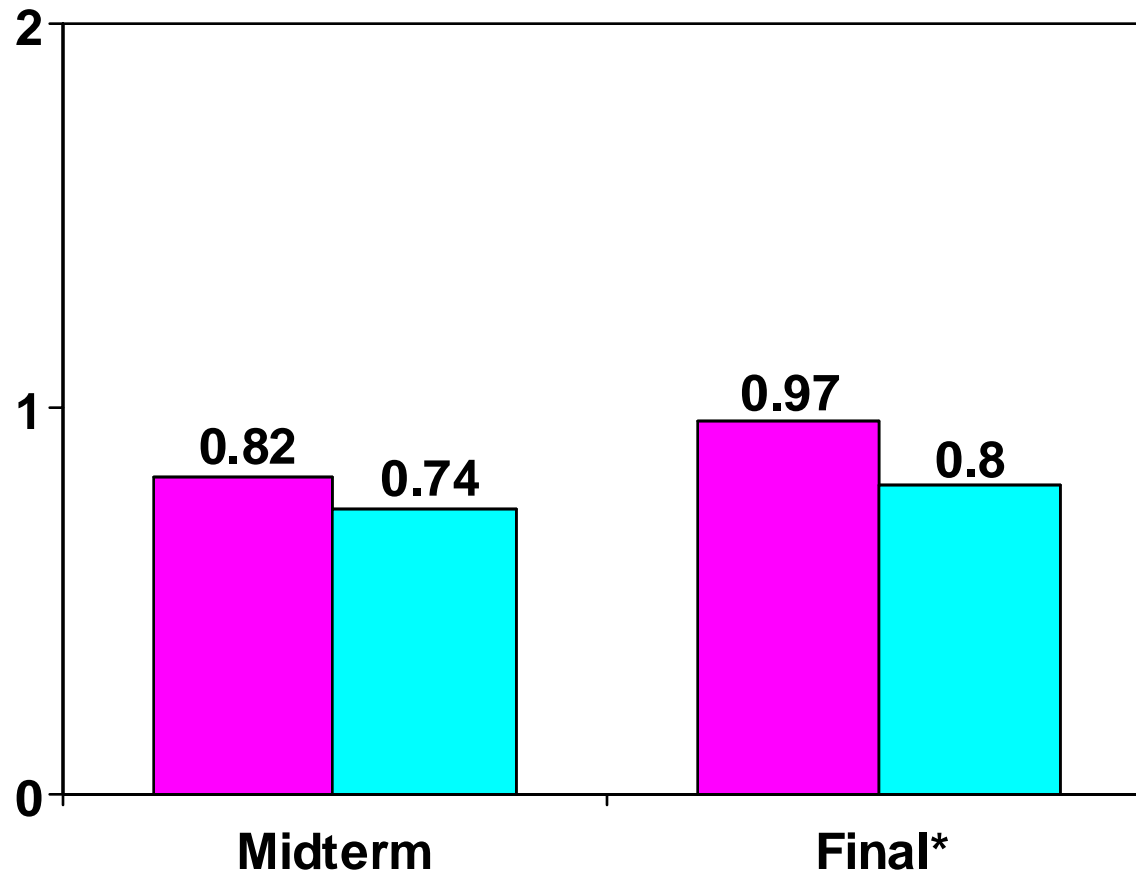
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Rural HWs: Discussed Safer Sex with Partner (2 items, # discussed)



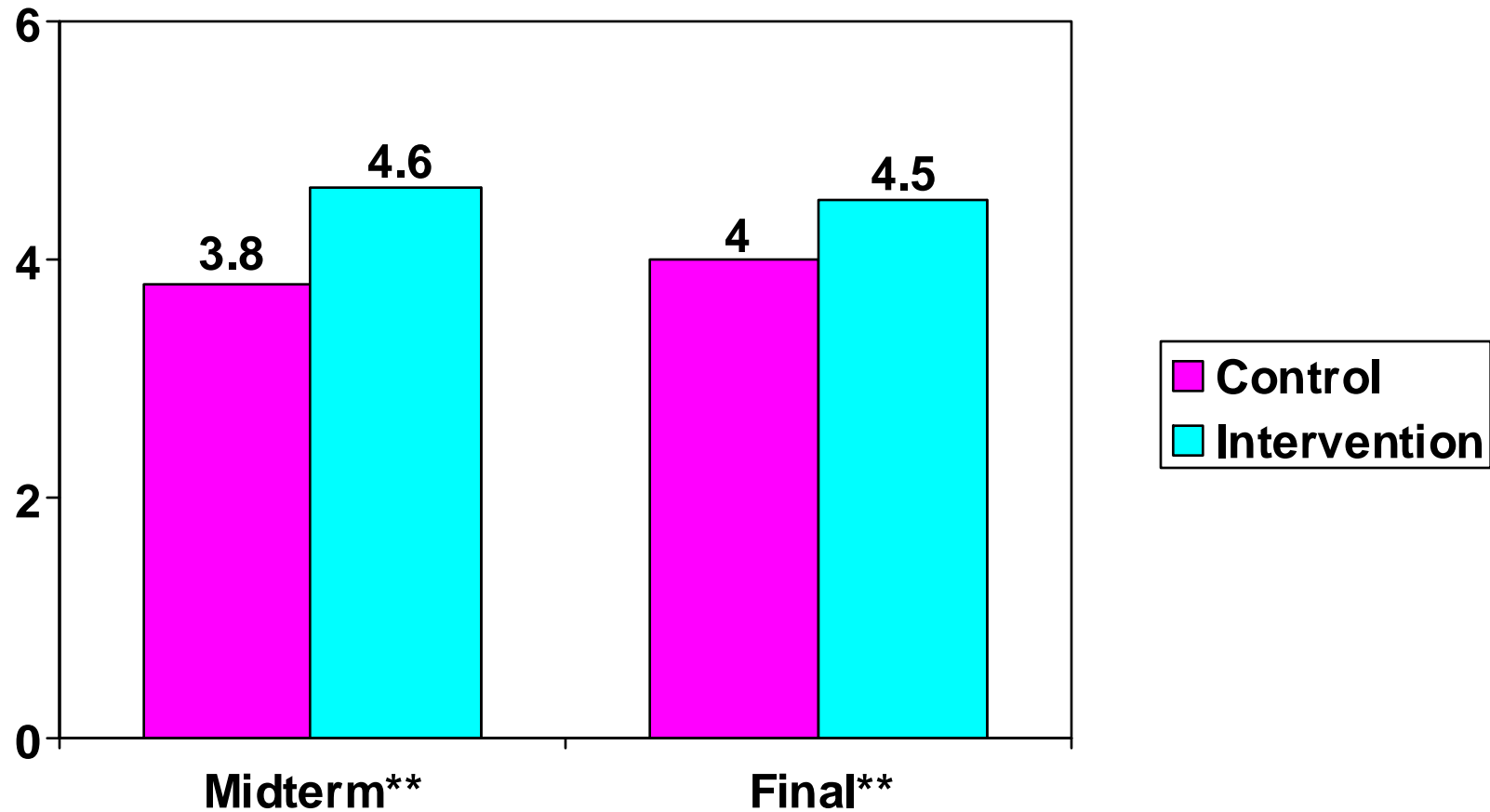
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Rural HWs: Risky Sex Practices (5 items, # reported for last 2 mo.)



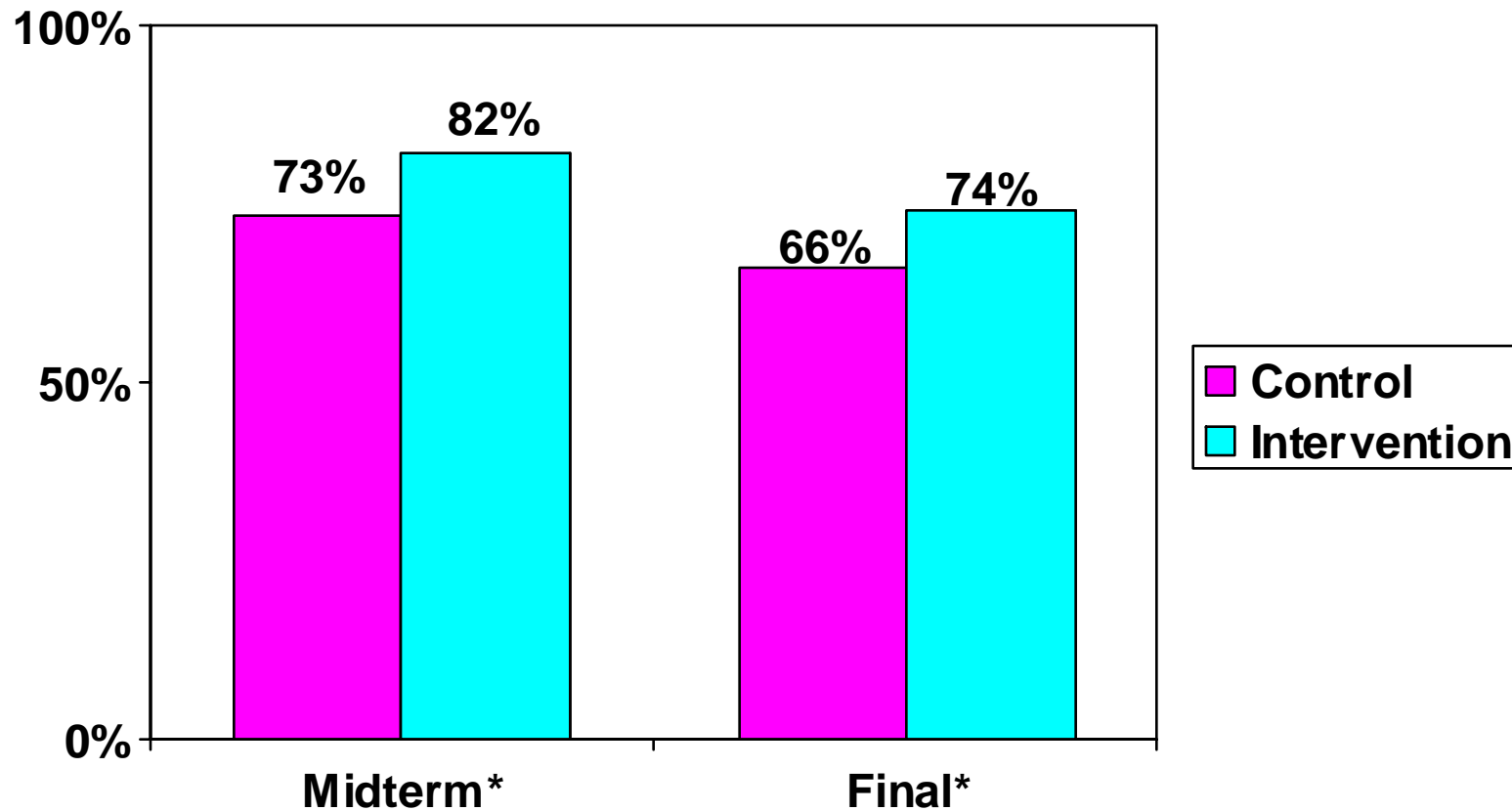
* $p < .05$

Rural HWs: Community HIV Prevention (6 activities, # done in last 2 mo.)



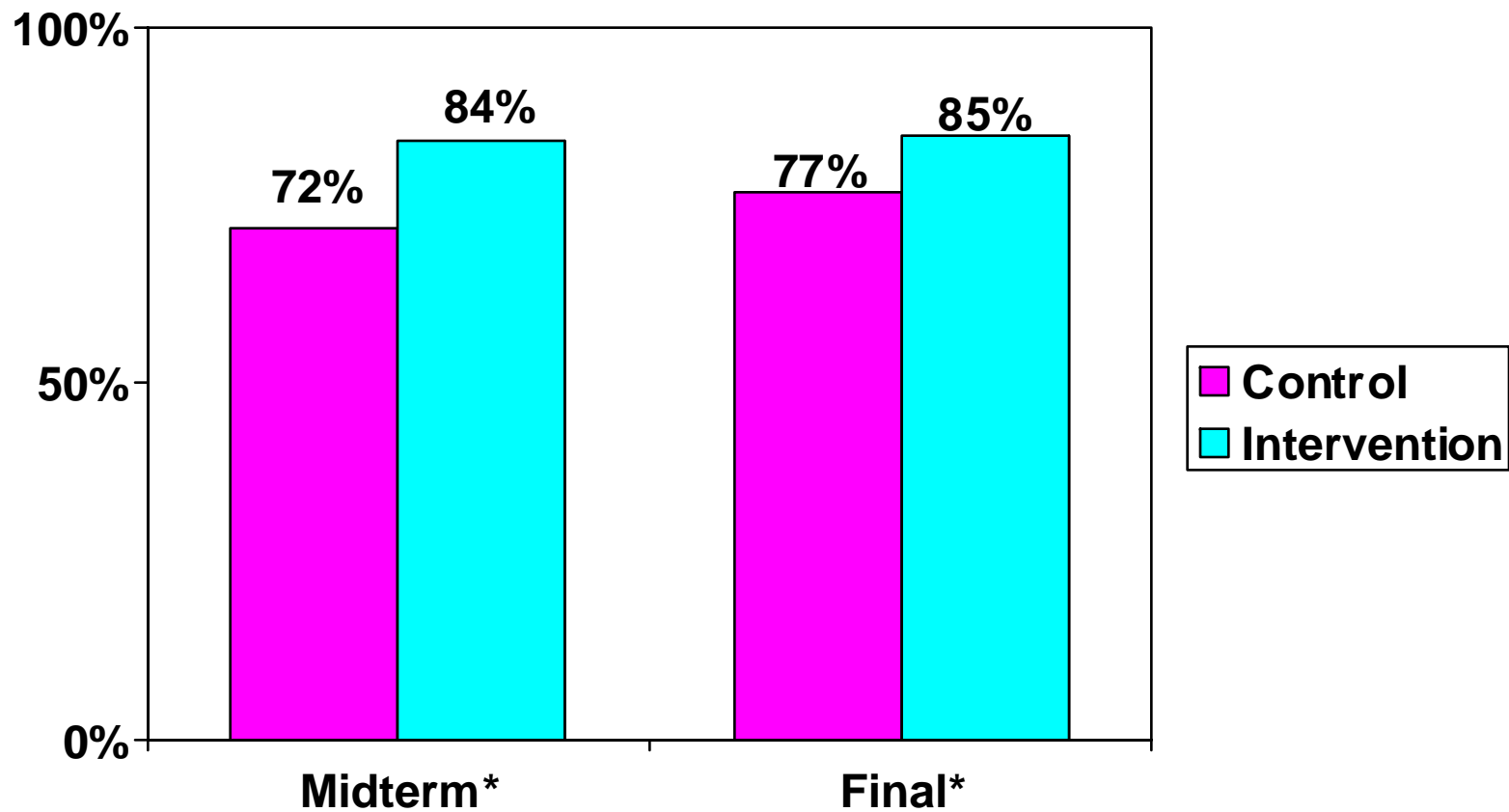
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Rural HWs: Observed Hand Washing After Contamination (%)



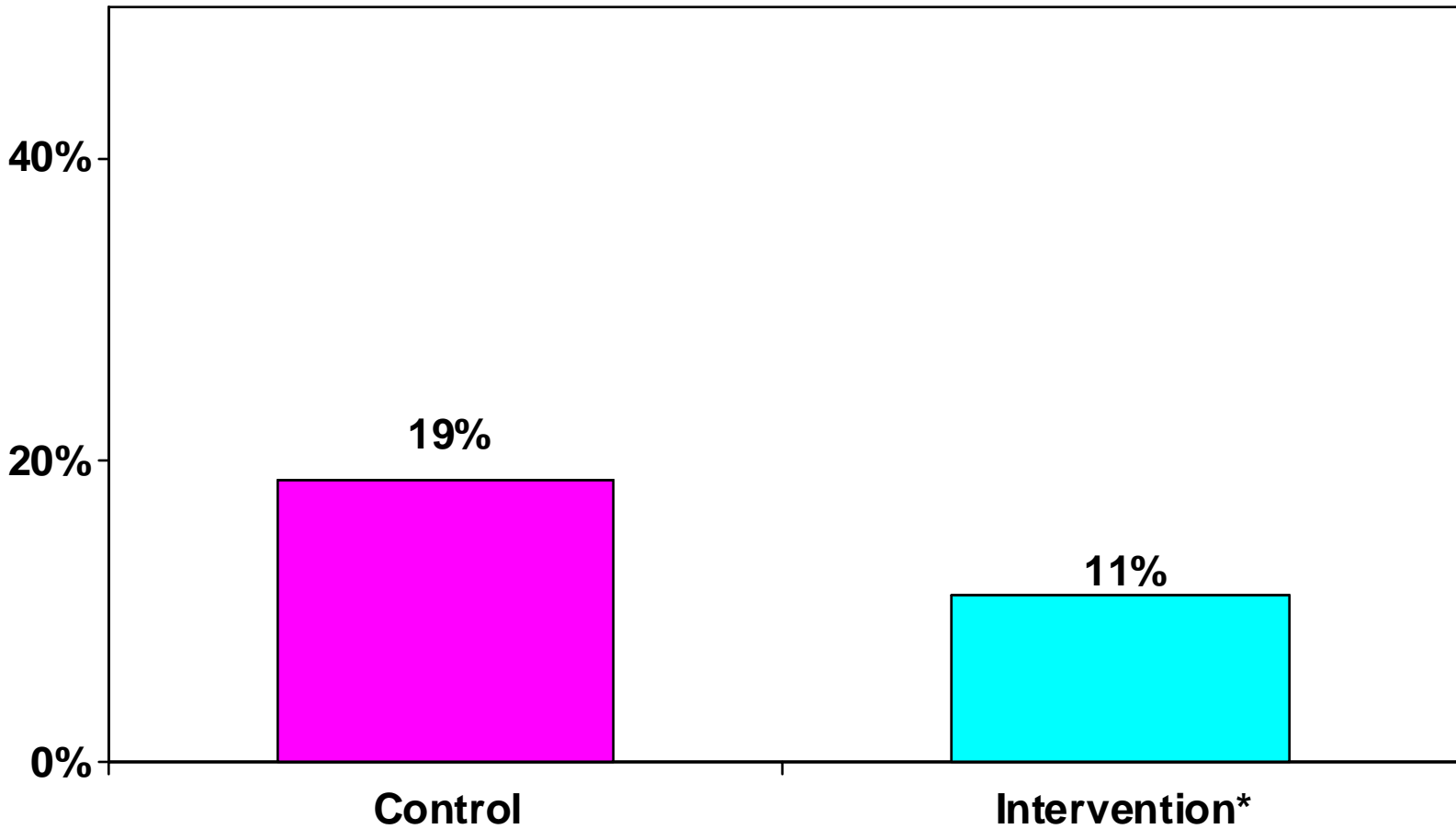
*p < .05

Rural HWs: Observed Glove Wearing for Contamination (%)



*p < .05

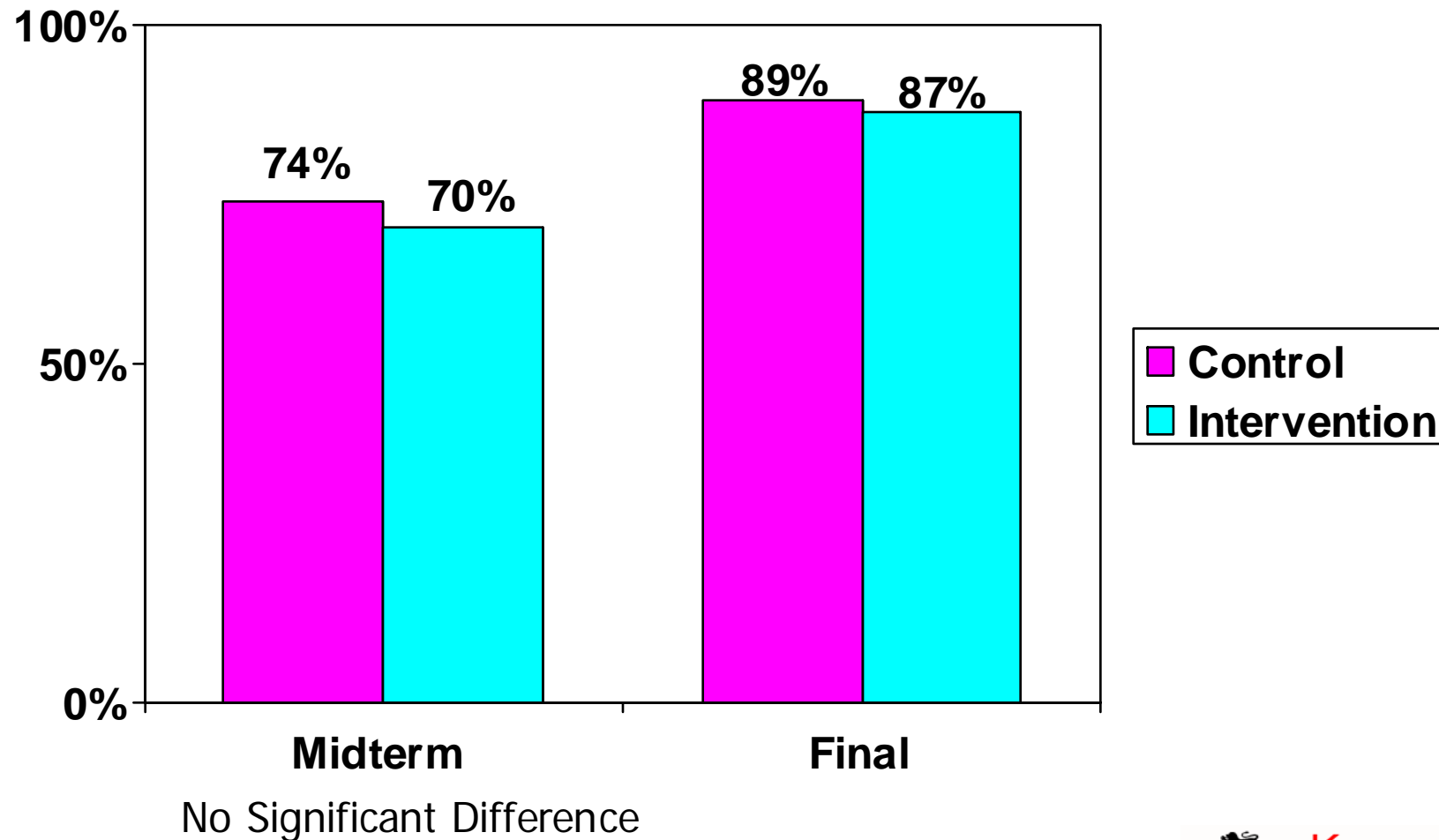
Rural HWs: Reported Needlestick Injuries in Last 6 Months (%) *



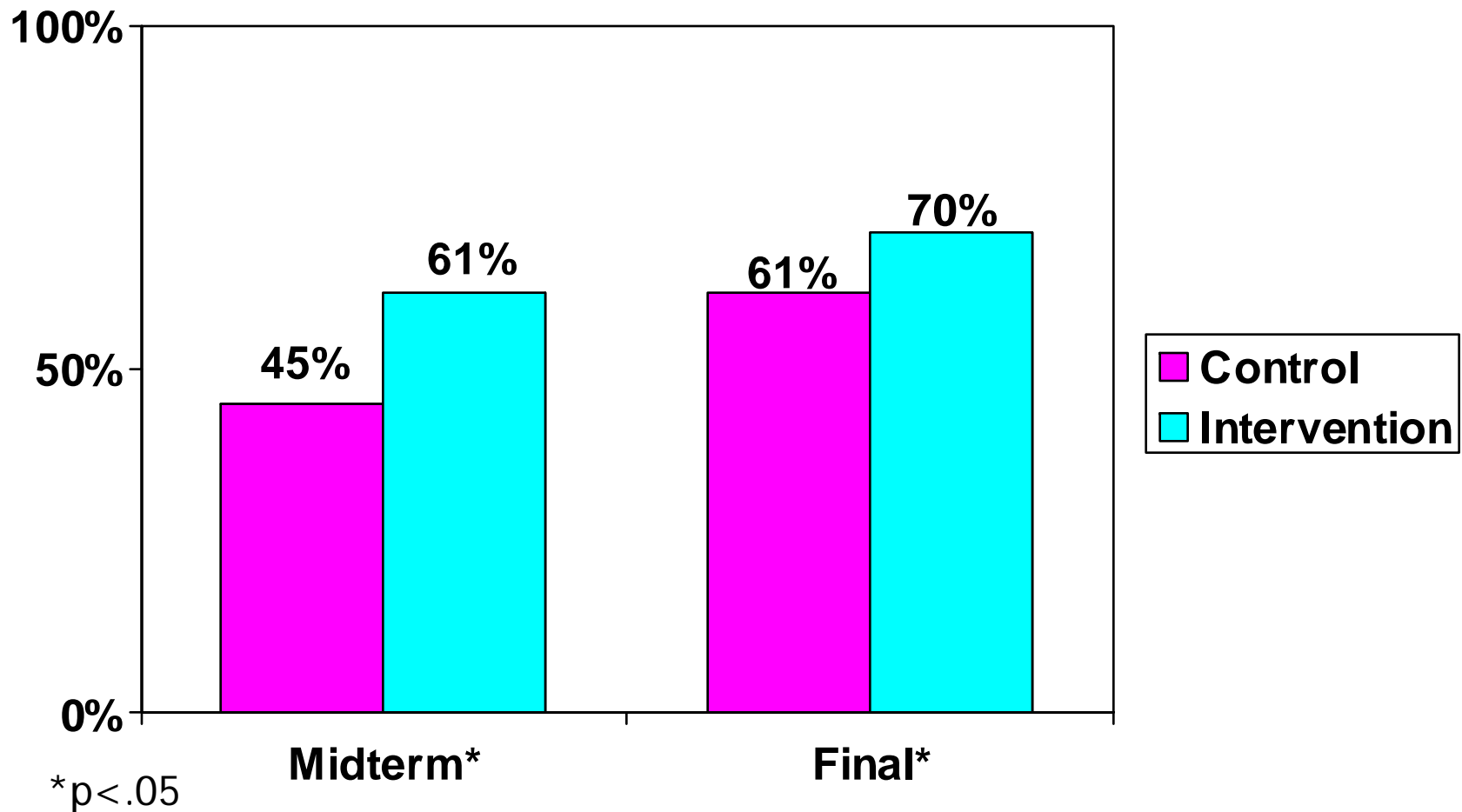
*p<.05, Question asked at final evaluation only

Rural HWs: Observed Interactions

(% done of 11 items for respectful interactions with clients/families)



Rural HWs: Observed Use of Opportunity to Teach (% Yes)



Rural HWs: Summary



- Greater **knowledge** about HIV and AIDS prevention
- Improved **attitudes** regarding:
 - Less blaming of people with HIV
 - More favorable attitudes toward HIV testing and condom use
 - Increased self efficacy for safer sex

Rural HWs: Summary



- **Personal behavior** changes
 - More HIV tests (final only)
 - More communication with partner (midterm only)
 - Fewer risky sexual behaviors (final only), for example having sex with persons met at a bar or sex for money
 - More involvement in community HIV prevention activities

Rural HWs: Summary



- Appropriate hand washing and glove wearing were significantly greater
- Fewer reported needle stick injuries
- Respectful interactions did not differ significantly
- General teaching was significantly higher

Rural HWs: Discussion



- All rural HWs should receive the intervention because it:
 - Helped health workers to protect themselves from HIV infection at home and at work
 - Improved their ability to be role models in the communities
 - Increased workplace safety
 - Increased support for HIV prevention among co-workers
 - Improved client teaching

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