



# Imitating Behavior: Do-As-I-Do Dog Training

## Children Train Dogs to Imitate Human Behavior.

Madison Gray, Shelby Wanser, Dr. Kristen Moore, Dr. Monique Udell, Dr. Megan MacDonald  
College of Agricultural Sciences, Oregon State University, Corvallis, OR.



### Introduction:

- Dogs have been shown to have complex social interspecies interactions, learning through observing and replicating behavior.<sup>3</sup>
- Do-As-I-Do (DAID) training methods engage natural social learning skills of dogs, applying imitation learning to human behavior.<sup>1</sup>
- Evidence demonstrates dogs can apply learning skills to humans, observing, imitating, and recalling human behavior.<sup>1</sup>
- DAID training methods have been shown to have additional benefits when compared to clicker training methods alone in dog training.<sup>2</sup>

### Focus:

- Assisting with DAID training of children and dogs throughout a 10-day camp in Portland, Oregon.



- Six children and dog pairs were included in the camp.

### Methods:

- Set three goal foundational behaviors that the dog can perform solely based on voice command; ie: step on a platform, paw to target, nose to target, around a cone, jump, spin.
- Set three goal generalizing behaviors that the dog/person can both perform; ie: hit bowling pin, step on a platform, paw/hand to target, around a cone, jump, spin.
- Spend 10 days learning and practicing behaviors.
- Day 1: Introduce child to concepts of canine body language and practice skills such as sit, stay, and “watch me” to teach dog to observe the child.
- Days 2-4: Practice previous behaviors and introduce the three foundational behaviors.
- Days 5-6: Practice previous behaviors and introduce the generalizing behaviors.
- Days 7-8: Practice previous behaviors and introduce DAID for three foundation behaviors – child performs behavior and says “do it” while using supporting hand signals (Training Phase 1).
- Days 9-10: Practice Phase 1 until dog anticipates behaviors, then move onto next phases. Phase 2 uses voice commands only to instruct behaviors. Generalization Phase applies DAID to the learned generalization behaviors.
- Day 10: If dog is ready, enter Test Phase, where child performs a new, unfamiliar behavior, such as stand in hula hoop, and asks dog to “do it”.

### Results:

- Out of the six dogs included in the Portland study, five reached Phase 1 of the DAID training. The one dog who was unable to reach Phase 1 was the youngest dog in the group and struggled to stay focused, regardless of incentives.
- One dog reached the Test Phase, performing unfamiliar behaviors, such as step on basket, after observing the child perform them.

### Discussion and Conclusion:

- Overall, most dogs in the study were able to perform some level of DAID imitation-based behaviors. With more time, researchers believe additional dogs likely would have reached the DAID training Test Phase.
- Using positive reinforcement training, dogs learned new tricks and to imitate human behavior within 10 days, supporting DAID as an effective training strategy.
- Future research could examine if imitating behavior relies on a human-dog bond by asking a DAID trained dog to observe and imitate a stranger.



### Contact

Madison Gray  
OSU Student Researcher  
Email: graymad@oregonstate.edu

### References

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  2. Fugazza & Miklosi (2015). *App An Behav Science*, 171, 146-151.
  3. Topal et al. (2006). *Anim Cogn*, 9:355-367.
- Images used do not show Portland participants.

### Acknowledgements

Thank you, Oregon State University Beginner’s Researcher program, for providing me the opportunity to partake in this study. Thank you, Dr. Monique Udell, for granting me the position and providing kindness, mentorship, and guidance throughout. Thank you, Shelby Wanser, for providing your expertise and always keeping me busy. Thank you, Dr. Kristen Moore for working with me during the DAID camp, making the experience fun, and supporting my goals and ideas.