NTACT THE COLLABORATIVE | National Technical Assistance Center on Transition

PRACTICE DESCRIPTION

Using Video Modeling to Teach Food Preparation Skills

(Research-Based Practice)

What is the evidence base?

This is an evidence-based practice for students with disabilities based on seven methodologically sound single-case studies across 26 students with disabilities.

Where is the best place to find out how to do this practice?

The best place to find out how to use video modeling to teach food preparation skills is through the following lesson starters. Learn how to develop a video model by reading Kellems et al. (2016).

- Video Modeling – Food Preparation Skills – Lesson Starter 1 – Making Spaghetti
- Video Modeling – Food Preparation Skills – Lesson Starter 2 – Making Macaroni and Cheese
- Video Modeling – Food Preparation Skills – Lesson Starter 3 – Making Hot Chocolate
- Video Modeling – Food Preparation Skills – Lesson Starter 4 – Making French Fries

- **For Developing a Video Model:**
  - Kellems, R. O., Mourra, K., Morgan, R. L., Riesen, T., Glasgow, M., & Huddleston, R. (2016). Video modeling and prompting in practice: Teaching cooking skills. *Career Development and Transition for Exceptional Individuals*, *39*(3), 185-190. https://doi.org/10.1177/2165143416651718

With whom was it implemented?

- Students with
  - Autism (*n* = 8)
  - Intellectual disability (*n* = 17)
  - Fragile X syndrome (*n* = 1)
- Ages ranged from 13 - 22
- Males *(n* = 17), females (*n* = 9)
- Ethnicity
  - Not reported (*n* = 26)

What is the practice?

Video modeling is a form of video response prompting. Response prompting is defined as stimuli that later function as extra cues and reminders for desired behavior (Cooper et al., 2007). Video modeling includes watching recorded videos of oneself or others modeling ideal behavior (Bellini & Akullian, 2007). Video prompting is similar to video modeling in that it teaches a skill through video segments. In video prompting, students watch a segment, do the step in the task that segment showed, then watch another segment, and so on with feedback given at varying intervals depending on the needs of the students and the protocol being following (Hayes et al., 2015). This practice implemented teaching food preparation skills using video modeling.

In the studies used to establish the evidence base for using video modeling to teach food preparation skills, the videos were shown via:

- Portable DVD player (Mechling & Stephens, 2009; Mechling et al., 2009; Mechling & Gustafson, 2009)
- iPad (Kellems et al., 2018)
- VHS Tape (Lasater & Brady, 1995)
- iPhone (Smith et al., 2013)
- Laptop displaying PowerPoint slides with embedded video (Mechling & Collins, 2012)

In the studies used to establish the evidence base for using video modeling to teach the following skills were taught:

- Preparing spaghetti and macaroni and cheese using a cooktop (Kellems et al., 2018)
- Preparing a sandwich and packing a lunch (Lasater & Brady, 1995)
- Extinguishing cooking fires (Mechling et al., 2009)
- Cooking from a cookbook (Mechling & Gustafon, 2009)
- Multi-step cooking with a French fry recipe, broccoli recipe, and chocolate pudding recipe (Mechling & Stephens, 2009)
- Setting out snacks and drinks for a party (Smith et al., 2013)
- Completing fine motor tasks related to cooking and food preparation (Mechling & Collins, 2012)

Where has it been implemented?

- Apartment kitchen (4 studies)
- Classroom (1 study)
- Home environment (1 study)

- Secondary Transition School Program (1 study)

How does this practice relate to Common Core Standards?

- Key Ideas and Details (Anchor Standards for Reading, Grades 9-12)
    - Read closely to determine what the text says explicitly and to make logical inferences from it

How does this practice relate to the Common Career Technical Core?

- Use technology to enhance productivity.
    - Career-ready individuals find and maximize the productive value existing and new technology to accomplish tasks and solve workplace problems. They are flexible and adaptive in acquiring and using new technology. They are proficient with ubiquitous technology applications. They understand the inherent risk, personal and organizational of technology applications, and they take actions to prevent or mitigate these risks.

References used to establish this evidence base:

Kellems, R. O., Rickard, T. H., Okray, D. A., Sauer-Sagiv, L., & Washburn, B. (2018). iPad® video prompting to teach young adults with disabilities independent living skills: A maintenance study. *Career Development and Transition for Exceptional Individuals*, *41*(3), 175–184. https://doi.org/10.1177/2165143417719078

Lasater, M.W., & Brady, M.P. (1995). Effects of video self-modeling and feedback on task fluency: A home based intervention. *Education and Treatment of Children, 18*, 389-407. https://www.jstor.org/stable/42899425

Mechling, L. C., & Collins, T. S. (2012). Comparison of the effects of video models with and without verbal cueing on task completion by young adults with moderate intellectual disability. *Education and Training in Autism and Developmental Disabilities*, *47*(2), 223–235. https://www.jstor.org/stable/23880102

Mechling, L. C., Gast, D. L., & Gustafson, M. R. (2009). Use of video modeling to teach extinguishing of cooking related fires to individuals with moderate intellectual disabilities. *Education and Training in Developmental Disabilities, 44*(1), 67–79. https://www.jstor.org/stable/24233464

Mechling, L.C., & Gustafon, M. (2009). Comparison of the effects of static picture and video prompting on completion of cooking related tasks by student with moderate intellectual disabilities. *Exceptionality, 17*, 103-116. https://doi.org/10.1080/09362830902805889

Mechling, L.C., & Stephens, E. (2009). Comparison of self-prompting of cooking skills via picture-based cookbooks and video recipes. *Education and Training in Developmental Disabilities, 44*, 218-236. https://www.jstor.org/stable/24233496

Smith, M., Ayres, K., Mechling, L., & Smith, K. (2013). Comparison of the effects of video modeling with narration vs video modeling on the functional skill acquisition of adolescents with autism. *Education and Training in Autism and Developmental Disabilities, 48*(2), 164–178. https://www.jstor.org/stable/23880637

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