**Report 2—Design Specifications**

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**Comments on Revisions**

One feedback point I received was to reword my instructional goal phrasing, so the goal is placed first. Based on this feedback, I reworded my instructional goal from “learners will identify food items using the WFPB quick guide to develop a meal plan for 5 days” to “Learners will develop a 5-day meal plan following the WFPB criteria.” Another feedback point was on my example of a complete task and the solution steps. Initially when completing the solution steps, I listed what learners would generate, but not a description of the thinking that must happen in order for learners to perform the intellectual skill. In my revision of report 1, I ensured to outline the thinking steps of the intellectual skill and what learners must do in their heads to complete the task. It was also suggested that my additional tasks and confirmed solution steps were too broad and included different instructional goals like “make” and “order.” I revised my additional tasks to align with my instructional goal and ask learners to develop meals and meal plans given different recipes (dessert, Superbowl themed and snacks). By outlining these updated additional tasks, I was able to confirm my solution steps.

Based on feedback from report 1 that informed me that the internet should not be used, and all materials needed for instruction must be provided in the module, my goal analysis changed substantially. I removed all analysis steps related to locating recipes on the internet or finding recipes at home and provided learners with recipes and ingredients that they will use during instruction and to perform the intellectual skill. In my terminal objective, the givens changed from “given the WFPB criteria” to “given a collection of recipes.” My revised terminal objective is: “Given a collection of recipes, learners will correctly develop a meal plan for 5 days for breakfast, lunch and dinner that adheres to the WFPB criteria.” I also received feedback that the action verbs used in the goal analysis steps would benefit from variety. I altered two of my analysis steps to be “discern” and “isolate” instead of “identify.” With the removal of any analysis steps that included the internet, I revised my context and learner analysis to omit any mention that learners will need access to the internet and trusted recipes at home. Recipes will be provided as an appendix in the module and within the instruction during opportunities to practice.

Finally, after reflecting on how I would assess each objective and beginning my design evaluation chart, I realized that my instructional goal is more aligned to ‘isolating recipes and modifying recipes,’ than it is to ‘developing a meal plan.’ Therefore, my instructional goal and terminal objective underwent another revision. I revised my instructional goal to “Learners will isolate WFPB recipes and modify non-WFPB recipes following the Whole foods Plant Based (WFPB) criteria” and my terminal objective to: “Given a collection of recipes, learners will correctly isolate WFPB recipes and correctly modify non-WFPB recipes that adhere to the WFPB criteria.”

**Revised Goal Statement and Instructional Analysis**

1. **Instructional Goal:** Learners will modify non-WFPB recipes following the Whole Foods Plant Based (WFPB) criteria.

**2) Identify example of complete task:**

*Inputs: (givens of the task of the problem)*

Using the following recipes, isolate WFPB recipes and modify non-WFPB recipes following the Whole Foods Plant Based (WFPB) criteria.

|  |  |
| --- | --- |
| *Traditional Spaghetti and Meatballs*  1 jar parmesan spaghetti sauce  1 pound beef meat balls  3 Tbsp Light olive oil  1 pound spaghetti  2 Tbsp basil, finely minced  Salt & pepper to taste | *Oil-free Arugula salad*  fresh baby arugula  freshly squeezed lemon juice  freshly cracked black pepper |
| *No Bake Peanut Butter Granola Bars*  1 tablespoon ground flaxseed mixed with 1/4 cup warm water  1 cup brown rice crisp cereal (non-sweetened)  1 cup quick cooking oats  1 tablespoon tapioca starch  1/2 cup all-natural creamy peanut butter with no additives  1/2 cup pure maple syrup  1 teaspoon vanilla extract | *Eggplant Stir-Fry*  1 large eggplants, diced  1/2 cup vegetable broth for sauteing veggies  1 medium onions, sliced  2 cloves garlic, chopped  1 medium carrots, peeled and chopped  1 medium red bell pepper, sliced  1 medium green bell pepper, sliced  1/4 teaspoon cayenne pepper powder  2 tablespoons Tamari or soy sauce  1 teaspoon black pepper, optional  2 cups brown rice |
| *Artichoke and Pasta Salad*  1 package cooked rotini pasta  2 cups artichokes in oil  1 cup finely chopped red onions  3-4 large tomatoes diced  2 cups chopped parsley  Dressing:  2 lemons squeezed (juice)  2 tbsp tahini  6 tbsp olive oil  1 tsp chopped garlic  2 tbsp red wine vinegar  3 tbsp dried oregano | *Homemade Veggie Pizza*  1 store-bought pizza shell  1 cup pizza sauce or marinara  2 cups baby spinach  2 to 3 cups shredded low-moisture part-skim mozzarella cheese  ½ cup jarred artichokes in oil  ½ cup fresh red or orange bell pepper  ½ cup red onion, cut into thin wedges  ½ cup halved cherry tomatoes  ½ cup pitted Kalamata olives, halved lengthwise  Fresh basil |
| *Blueberry Overnight Oats*  ½ cup (50 g) rolled oats  ½ cup skim milk  ¾ tbsp pure maple syrup  ¼ teaspoon pure vanilla extract  ¼ cup (25 g) fresh or frozen blueberries  ¼ cup (25 g) fresh blueberries | *Vegan Blueberry Muffins*  1 1/4 cup unsweetened soy milk  1 teaspoon apple cider vinegar  2 cups all-purpose flour (see notes for substitutions)  1 cup granulated sugar  2 teaspoons baking powder  1/4 teaspoon salt  1 tablespoon cornstarch  1/3 cup coconut oil  1 teaspoon pure vanilla extract  1 1/2 cups fresh blueberries |
| *FOK Spinach Potato Tacos*  2 large Yukon gold potatoes, scrubbed and cut into small dice  1 (10-ounce) package frozen spinach, thawed  1 large onion, diced  1 medium poblano pepper, seeded and diced  2 cloves garlic, minced  2 teaspoons ground cumin  1 cup unsweetened, unflavored plant milk  3 tablespoons nutritional yeast  Sea salt and freshly ground black pepper  12 corn tortillas  ½ cup chopped fresh cilantro | *Easy Sloppy Joes*  1 medium onion, diced  1 green bell pepper, diced  1 clove garlic, minced  1 pound lean ground beef  12 ounces (1 1/3 cup) tomato sauce  3/4 cup ketchup  2 tablespoons brown sugar  2 tablespoons Worcestershire sauce  1 tablespoon yellow mustard  1 tablespoon red wine vinegar  1 teaspoon paprika  Pinch of cayenne pepper  6 hamburger buns, toasted |
| *Stuffed Peppers*  6 large red, orange or yellow bell peppers  3 tablespoons olive oil  1 pound ground beef  2 medium onions, chopped  4 cloves garlic, finely grated  2 teaspoons thyme leaves  Kosher salt and freshly ground black pepper  4 plum tomatoes, cored and cut into 1/2-inch pieces  2 tablespoons tomato paste  1 cup dry white wine  1 cup low-sodium chicken broth  2 cups cooked white rice  1 cup shredded Muenster cheese | *Hot Breakfast Couscous*  2 cups almond milk  1 chopped apple  3 teaspoons ground cinnamon  2 cups dry couscous  ⅓ cup chopped dried apricots  ⅓ cup raisins  ¼ cup slivered almonds |
| *Fat-Free Vegan Black Bean Chili*  1 red onion, diced  5 cloves garlic, minced  1 tablespoon chili powder  1 tablespoon cumin  1 (14.5-ounce) can diced tomatoes  2 teaspoons diced chipotles in adobo  (3) 15-ounce can black beans, drained and rinsed  1 cup uncooked split red lentils  (2) 15-ounce cans tomato sauce  2-3 cups vegetable broth  juice of 1 lime | *Vegan Fat-Free Broccoli Soup*  2 pounds broccoli with stems  1⁄2 medium onion, roughly chopped  1 leak roughly chopped  1 small potato, scrubbed and roughly chopped  1 teaspoon garlic powder  2 cups fresh or frozen green peas  1⁄8 teaspoon freshly ground black pepper  3 tablespoons fresh lemon juice (from 1 to 2 lemons)  1 tablespoon finely chopped fresh dill  Sea salt |
| *Fat-Free Lentil Soup*  3 medium carrots, cut into 1/4-inch pieces  1 medium onion, diced  1 large celery stalk (about 2 ounces)  Kosher salt and freshly ground black pepper  2 tablespoons tomato paste  1 large clove garlic, minced  1 1/2 cups dried brown lentils  4 cups beef broth  7 sprigs thyme, leaves stripped  1/2 teaspoon dried oregano  1/4 teaspoon crushed red pepper flakes  1 teaspoon lemon zest, plus the juice of 1/2 lemon (about 2 tablespoons)  1/2 cup flat-leaf parsley leaves | *WFPB Berry-Banana Smoothie Bowls*  ½ to ⅔ cup unsweetened, unflavored plant milk, such as almond, soy, cashew, or rice  1 tablespoon pure maple syrup  1 cup fresh spinach  1½ cups frozen blueberries  2 bananas, peeled, sliced, and frozen  ½ cup fresh blueberries  1 kiwifruit, peeled and sliced  2 tablespoons chopped toasted walnuts  1 tablespoon bran flakes  1 tablespoon unsweetened coconut flakes, toasted  2 teaspoons chia seeds |
| *Spicy Chickpea Curry*  1 medium onion, finely chopped (1 cup)  1 Yukon gold potato, cut into ½-inch cubes (1 cup)  1 tablespoon curry powder  2 teaspoons garlic powder  Dash cayenne pepper  2 cups chopped kale, with stems  1½ cups cooked chickpeas  1 cup unsweetened, unflavored plant-based milk  ½ of a 15-oz. can diced tomatoes (¾ cup), undrained  2 tablespoons finely chopped cilantro  2 tablespoons lemon juice  1½ cups cooked brown rice, warmed | *Easy Vegan Dumplings*  30-36 **gyoza/ dumpling/ wonton wrappers**  6 tbsp **vegetable oil**  1 cup **cabbage** (shredded in food processor)  1 cup **carrot** shredded  2 cups **mushrooms** (finely chopped)  3/4 cup firm or extra firm **tofu** (crumbled)  2 tsp **ginger** (grated)  2 tsp **garlic** (grated)  2 tbsp **soy sauce**  2 tbsp **sriracha sauce**  1 tbsp **sesame oil** |
| *Vegan Breakfast Burrito*  4-5 medium-sized (600 g) potatoes  1/2 tbsp oil  1 avocado sliced  15 oz can of kidney beans drained and rinsed  1 green pepper chopped (or color of choice)  2 tomatoes chopped  1 onion chopped  2 cloves of garlic minced  2-3 tbsp red cabbage shredded  flour tortillas  3/4 tsp ground cumin  2 tbsp onion powder  1/3 tsp smoked paprika  2 tbsp (32 g) cashew butter  Juice of 1/2 lime  1/4 tsp garlic powder  Hot sauce to taste | *Oil-Free Vegetable Soup*  1/4 cup vegetable broth low sodium  4 cloves garlic minced  1.5 cups red onion or 1 medium  4 large carrots coarsely chopped  10 oz crushed tomatoes  2 med green bell pepper coarsely chopped  1/2 tsp onion powder  1/2 tsp garlic powder  6-8 cups water  15 oz can tomato sauce  6 oz tomato paste  15 oz white beans low sodium  1.5 large yellow squash coarsely chopped  2 tbsp lemon juice fresh squeezed |
| *WFPB Brown Rice with Tofu Satay*  1 oz scallions  ½ oz tamari or soy sauce  ¼ cup all-natural peanut butter  1 lime  1 oz fresh ginger (use half)  garlic (use 1 large clove)  ½ lb green beans  1 pkg extra-firm tofu  2 cups brown rice | *Vegan Oil-Free Spaghetti Squash Pad Thai*  1 large spaghetti squash  3 tablespoons vegetable broth  ½ teaspoon chopped ginger  ½ cup chopped yellow onion  1 sliced red bell pepper  1 cup matchstick carrots  Green onions, fresh cilantro and lime wedges  4 tablespoons soy sauce  2 tablespoons rice vinegar  2 tablespoons fresh lime juice  1 tablespoon sriracha sauce |
| *FOK Frozen Chocolate Banana Breakfast Bites*  ⅓ cup unsweetened cocoa powder  ⅓ cup unsweetened plant milk, such as almond, soy, cashew, or rice  ¼ to ⅓ cup pure maple syrup  teaspoons pure vanilla extract  ripe bananas  cups rolled oats  1½ cups Grape-Nuts cereal | *Forks Over Knives Spicy Tomato Sushi Rolls*  1½ cups low-sodium vegetable broth  ¾ cup dry short grain brown rice  1½ cups frozen riced butternut squash  4 roma tomatoes, seeded and chopped (2 cups)  1 tablespoon reduced-sodium tamari  1 teaspoon grated fresh ginger  1 tablespoon sriracha sauce  2 teaspoons tahini  2 tablespoons brown rice vinegar  1 tablespoon pure maple syrup  4 8-inch toasted nori sheets  ½ of a medium avocado, peeled and sliced  1 cucumber, seeded and cut lengthwise  2 carrots, coarsely shredded (1 cup)  4 scallions (green onions |

*Goal (identification of the product or activity that results from performing the task)*

Learners will modify non-WFPB recipes following the WFPB criteria.

*Solution (a set of activities or steps that transform the givens into the goal)*

**1. Isolate recipes for based on food preferences**

**1.1 Review given recipes**

Reflect on recipes that you would like and might taste good.

**1.2 Select recipes based on food preferences**

Food preferences= Italian food, recipes with bananas, soup recipes

Selected recipes:

* *Traditional Spaghetti and Meatballs*
* *Fat-Free Lentil Soup*
* *FOK Frozen Chocolate Banana Breakfast Bites*

**2. Discern whether WFPB key terms are included in the recipe title**

**2.1 Determine if WFPB key terms are included in recipe title**

Yes, in the following recipes: “*Fat-Free Lentil Soup*” and “*FOK Frozen Chocolate Banana Breakfast Bites,”* the key terms “fat-free” and “FOK” are included

**3. Classify recipes with WFPB key terms and recipes without WFPB key terms.**

**3.1 Identify whether recipes with WFPB key terms contain all WFPB ingredients**

*Fat-Free Lentil Soup:*

*WFPB ingredients:*

* 3 medium carrots
* 1 medium onion
* 1 large celery stalk
* Kosher salt and freshly ground black pepper
* 2 tablespoons tomato paste
* 1 large clove garlic, minced
* 1 1/2 cups dried brown lentils
* 7 sprigs thyme, leaves stripped
* 1/2 teaspoon dried oregano
* 1/4 teaspoon crushed red pepper flakes
* 1 teaspoon lemon zest, plus the juice of 1/2 lemon (about 2 tablespoons)
* 1/2 cup flat-leaf parsley leaves

*Non-WFPB ingredients*:

* 4 cups beef broth

The *Fat-Free Lentil Soup* although it uses the key term “fat-free” still includes non-WFPB ingredients. The soup has beef broth which is a meat product.

*FOK Frozen Chocolate Banana Breakfast Bites*

*WFPB ingredients:*

* ⅓ cup unsweetened cocoa powder
* ⅓ cup unsweetened plant milk, such as almond, soy, cashew, or rice
* ¼ to ⅓ cup pure maple syrup
* teaspoons pure vanilla extract
* ripe bananas
* cups rolled oats
* 1½ cups Grape-Nuts cereal

The *FOK Frozen Chocolate Banana Breakfast Bites* recipe includes all WFPB ingredients.

**3.2 Identify whether recipes without WFPB key terms contain all WFPB ingredients**

*Traditional Spaghetti and Meatballs*

*WFPB ingredients:*

* 2 Tbsp basil, finely minced
* Salt & pepper to taste

*Non-WFPB ingredients*:

* Parmesan spaghetti sauce
* Beef meat balls
* Olive oil
* Spaghetti

*Traditional Spaghetti and Meatballs* contains spaghetti sauce which is not WFPB because it contains cheese, which is a dairy product, beef meat balls which is not WFPB because it is an animal product, olive oil which does not follow WFPB criteria because it is an oil (processed fat) and white flour spaghetti, which does not follow WFPB because it is white pasta and not whole wheat.

**4. Modify all recipes that contain non-WFPB ingredients to follow WFPB criteria**

**4.1 For each recipe, substitute non-WFPB ingredients with WFPB ingredients**

*Fat-Free Lentil Soup:*

*Non-WFPB ingredients*:

* 4 cups beef broth

*WFPB substitutions*:

* The beef broth can be substituted with vegetable broth

*Traditional Spaghetti and Meatballs*

*Non-WFPB ingredients*:

* Parmesan spaghetti sauce
* Beef
* Olive oil
* Spaghetti

*WFPB substitutions:*

* Parmesan spaghetti sauce can be substituted with vegan, oil-free spaghetti sauce
* Beef can be substituted with rice and cauliflower meat balls
* Olive oil can be substituted with vegetable broth
* The spaghetti can be substituted with whole wheat spaghetti

**3) Identify additional tasks and confirm solution steps/rules:**

Due to learner’s food preferences, the correct answer or correct final project will vary. However, if learners’ solution contains WFPB recipes and modified recipes with all WFPB ingredients, then they have successfully performed the task.

* Using the following recipes, isolate and modify a snack recipe following the WFPB criteria:

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| *Chips and Homemade Salsa*  Corn tortilla chips in a bag  Salsa  1 1/4 lbs ripe Roma tomatoes  1 can petite diced tomatoes  2 green onions  1/3 cup chopped red onion  1 jalapeno pepper  1/3 cup fresh cilantro  1 large clove garlic, roughly chopped  2 Tbsp fresh lime juice  1/2 tsp chili powder  1/4 tsp ground cumin  1/2 tsp granulated sugar  Salt and pepper to taste |
| *Roasted Chickpeas*  1 can chickpeas  1 tablespoon olive oil  1 tablespoon chipotle powder  ½ teaspoon salt |
| *Steamed Edamame with Sea Salt*  2 cups edamame  ½ teaspoon salt  ½ teaspoon pepper |

* Using the following recipes, isolate and modify a dessert recipe following the WFPB criteria.

|  |  |
| --- | --- |
| *Vegan Chocolate Pudding*  1 1/2 cups raw cashews (7 ounces)  3 tablespoons natural cocoa powder  3/4 cup unsweetened plant-based milk  1/4 cup pure maple syrup  1 teaspoon pure vanilla extract  3 ounces melted semi-sweet chocolate  Pinch of kosher salt | Vegan Lemon Bars Crust 9 soft Medjool dates pitted  1 cup walnuts  ¾ cup gluten-free whole rolled oats  ¼ teaspoon sea salt Filling 1 14- ounce can coconut cream  1 ¼ cups raw cashews  2 tablespoons lemon zest  ⅓ cup fresh lemon juice  ⅓ cup maple syrup  ⅛ teaspoon sea salt |

* Using the following recipes, isolate and modify 2 dinner recipes for the Superbowl weekend following the WFPB criteria.

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| *Vegan Jalapeno Poppers*  12 jalapenos, halved and deseeded  8 oz vegan cream cheese  2 cloves garlic, finely minced  ½ of a lemon, juiced  2 tablespoons nutritional yeast  ¼ cup fresh parsley, finely chopped  ½ cup shredded non-dairy cheddar cheese  ½ cup regular breadcrumbs  ½ teaspoon salt  Pepper to taste |
| *FOK Crispy Potato Vegan Cheese Sticks*  1 lb. Yukon gold potatoes, peeled and cut into 1-inch cubes  1¼ cups unsweetened plant milk, such as almond, soy, cashew, or rice; divided  ¼ teaspoon agar powder  3 tablespoons nutritional yeast, divided  1½ teaspoon white wine vinegar  1 teaspoon lemon juice  ½ of a small garlic clove, minced  ¼ teaspoon freshly ground black pepper, divided  3 tablespoons arrowroot powder  ¾ cup whole grain bread crumbs  1 tablespoon ground flaxseeds  1 teaspoon Italian seasoning  ¼ teaspoon paprika  1 cup oil-free marinara sauce |
| *Chipotle Hummus Cheesy Quesadillas*  1 8-oz. container oil-free hummus  2 chipotle chiles in adobo sauce, finely chopped  1 12-oz. package frozen unseasoned Mexican or Southwest corn blend  1 15-oz. can no-salt-added black beans, rinsed and drained (1½ cups)  ½ cup sliced scallions  12 6-inch corn tortillas  1 cup fresh salsa  ½ cup chopped fresh mango  1 cup cheddar cheese |

**4) Terminal Objective: what the learner will be able to do at the end of the session:**

Given a collection of recipes, learners will correctly modify non-WFPB recipes that adhere to the WFPB criteria.

**Subordinate Skills Analysis:**

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| --- | --- | --- | --- |
| ***Goal Analysis Steps*** | ***Goal Analysis Substeps*** | ***Subordinate Skills*** | ***Entry Behaviors*** |
| 1. Isolate recipes based on food preferences | 1.1 Review given recipes | 1.1.1 Name food preferences | Read recipes and ingredient lists |
| 1.2 Select recipes based on food preferences |  |  |
| 2. Discern whether WFPB key terms are included in the recipe title | 2.1 Determine if WFPB key terms are included in recipe title | 2.1.1 Name WFPB key terms |  |
| 3. Classify recipes with WFPB key terms and recipes without WFPB key terms | 3.1 Identify whether recipes with WFPB key terms contain all WFPB ingredients | 3.1.1 Define a WFPB lifestyle |  |
| 3.1.2 Distinguish between WFPB ingredients and non-WFPB ingredients |  |
| 3.2 Identify whether recipes without WFPB key terms contain all WFPB ingredients |  |  |
| 4. Modify all recipes that contain non-WFPB ingredients to follow WFPB criteria | 4.1 For each recipe, substitute non-WFPB ingredients with WFPB ingredients | 4.1.1 Identify WFPB food substitutions | Distinguish between food items in the five main food groups |

**Design Evaluation Chart**

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| --- | --- | --- | --- |
| **Objectives** | **Relevant Steps, Sub steps, Subordinate Skills from Instructional Analysis** | **Sample Assessment Item**  (Correct answers marked with \*) | **Type of Test and Number of Similar Items** |
| 1. When required to define WFPB lifestyle, (CN), correctly (CR) define a WFPB lifestyle (B). | 3.1.1 Define a WFPB lifestyle | 1. Use the space below to answer the following question. Define a WFPB lifestyle. Be sure to mention the key features of WFPB living, differences between vegan and WFPB, WFPB food groups, foods to avoid and foods to consume minimally.  Answer Key:  A WFPB lifestyle emphasizes a large variety of whole, unrefined foods (fruits, vegetables, legumes and whole grains) and excludes meat, dairy products, eggs, and highly refined foods such as bleached flour and rice, refined sugar, chips and oil. A WFPB lifestyle consumes plant milk, nuts, seeds, tofu and tempeh minimally, since these foods are high in fat.  **This question may require a checklist for assessment:** The definition of a WFPB lifestyle should mention:  \_\_\_\_WFPB food groups: fruits, vegetables, tubers and starchy vegetables, whole grains and legumes  \_\_\_\_WFPB emphasizes and incorporates lots of vegetables, fruits, legumes and whole grains  \_\_\_\_WFPB avoids or minimizes meats, poultry, seafood, eggs, dairy, oil and processed and highly refined foods  \_\_\_\_Minimally consumes nuts, seeds, plant milk, tofu and tempeh  \_\_\_\_Vegan avoids animal products, but does not minimize or reduce oils, processed foods and refined foods and does not limit the amount of nuts, seeds, tofu, tempeh and plant milk | Short answer  1 item like this  Pretest and Posttest |
| 2. Given a list of recipes (CN), isolate recipes to select (B) based on food preferences (CR). | 1. Isolate recipes based on food preferences  1.1 Review given recipes  1.1.1 Name food preferences  1.2 Select recipes based on food preferences | 2. Review the given recipes and their ingredients, reflecting on your food preferences. Use the space below to write the recipe title of 2 recipes you would like to use or modify to follow WFPB:  *“No-Tuna” Salad Sandwich*  **For the salad:**   * 1 (15-ounce) can chickpeas, rinsed and drained * 3 tablespoons tahini * 1 teaspoon dijon or spicy brown mustard * 1 tablespoon maple syrup or agave nectar * ¼ cup diced red onion * ¼ cup diced celery * ¼ cup diced pickle * 1 teaspoon capers, drained and loosely chopped * Healthy pinch each sea salt and black pepper * 1 tablespoon roasted unsalted sunflower seeds (optional)   **For Serving:**   * 8 slices whole-wheat bread * Dijon or spicy brown mustard * Romaine lettuce * Tomato, sliced * Red onion, sliced   *Crispy Buffalo Cauliflower Bites*   * ⅔ cup brown rice flour * 2 tablespoons almond flour * 1 tablespoon tomato paste * 2 teaspoons garlic powder * 2 teaspoons onion powder * 2 teaspoons smoked paprika * 1 teaspoon dried parsley * 1 head cauliflower, cut into 2-inch florets * ⅓ cup Frank’s hot sauce or barbecue sauce   *Perfect Carrot Cake*   * 2 cups (260g) **chopped pecans** * 1 and 1/2 cups (300g) **brown sugar** * 1/2 cup (100g) **granulated sugar** * 1 cup (240ml) **vegetable oil** * 4 large **eggs** * 3/4 cup **unsweetened applesauce** * 1 teaspoon **pure vanilla extract** * 2 and 1/2 cups **all-purpose flour** * 2 teaspoons **baking powder** * 1 teaspoon **baking soda** * 1/2 teaspoon **salt** * 1 and 1/2 teaspoons **ground cinnamon** * 1 teaspoon **ground ginger** * 1/4 teaspoon **ground nutmeg** * 1/4 teaspoon **ground cloves** * 2 cups (260g) **grated carrots**   Vanilla Frosting   * 5 ounces pitted whole dates, chopped * 1/2 cup unsalted raw cashews * ¼ cup milk * 1 teaspoon pure vanilla extract)   *Butternut Squash Soup*   * 2 tablespoons extra-virgin olive oil * 1 large yellow onion, chopped * ½ teaspoon sea salt * 1 butternut squash, peeled & seeded * 3 garlic cloves, chopped * 1 tablespoon chopped fresh sage * ½ tablespoon minced fresh rosemary * 1 teaspoon grated fresh ginger * 3 to 4 cups vegetable broth * Freshly ground black pepper * Chopped parsley  1. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 2. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ | Short answer  1 item like this  Pre-test and Posttest  There will be no answer key for this question, since all answers are correct. Learners are choosing based on food preferences therefore answers will vary. |
| 3. Given a list of recipe titles (CN), correctly (CR) discern whether WFPB key terms are included in the recipe titles (B). | 2. Discern whether WFPB key terms are included in the recipe title  2.1 Determine if WFPB key terms are included in recipe title  2.1.1 Name WFPB key terms | 3. From the following list of recipe titles, select all the ‘Strictly WFPB’ key terms. More than one choice can be selected.   1. WFPB Cauliflower Tacos\* 2. Gluten-Free Low fat Homemade Pizza 3. Fat-Free Greek-Seasoned Chicken 4. Dairy-Free Banana Breakfast Bowl 5. Low Calorie Lettuce Wraps 6. Forks Over Knives Chickpea Omelet\* 7. Whole Foods Creamy Pasta Alfredo\* 8. Vegan Meat-Less Meatloaf 9. Plant-Based Black Bean Quesadillas\* | Multiple Choice  1 other item like this  Pretest and Posttest |
| 4. Given a list of ingredients (CN), correctly (CR) distinguish between WFPB foods and non-WFPB ingredients (B) | 3.1.2 Distinguish between WFPB foods and non-WFPB foods | 4. Match the following food items to the categories of WFPB foods and non-WFPB foods.  *Food Items Categories*  \_\_\_\_Avocado oil a. WFPB  \_\_\_\_Tomatoes b. Non-WFPB  \_\_\_\_Chips  \_\_\_\_Quick oatmeal  \_\_\_\_Blueberries  \_\_\_\_Whole wheat pita bread  \_\_\_\_Butter  \_\_\_\_Black beans  \_\_\_\_Shrimp  \_\_\_\_White rice  Answer Key  *Food Items Categories*  \_\_b\_\_Avocado oil a. WFPB  \_\_a\_\_Tomatoes b. Non-WFPB  \_\_b\_\_Chips  \_\_a\_\_Quick oatmeal  \_\_a\_\_Blueberries  \_\_a\_\_Whole wheat pita bread  \_\_b\_\_Butter  \_\_a\_\_Black beans  \_\_b\_\_Shrimp  \_\_b\_\_White rice | Matching  2 other items like this  Pretest and Posttest |
| 5. Given a list of recipes with WFPB key terms and recipes without WFPB key terms (CN), correctly (CR) identify whether recipes contain non-WFPB ingredients (B). | 3. Classify recipes with WFPB key terms and recipes without WFPB key terms  3.1 Identify whether recipes with WFPB key terms contain all WFPB ingredients  3.2 Identify whether recipes without WFPB key terms contain all WFPB ingredients | 5. Circle the following non-WFPB ingredients that need to be substituted from the following recipes. More than one item may be circled.  *Homemade Pho Soup*   * 7 ounces uncooked thin white rice noodles\* * 1 large white onion * 8 cups good-quality beef stock\* * 2 teaspoons fish sauce\* * 3-inch piece of fresh ginger * 5-star anise * 4 whole cloves * 3 (3-inch) cinnamon sticks * 2 cardamom pods * 1 tablespoon whole coriander seeds * 8 ounces raw steak\*   b. In the space below, briefly explain why the items do not follow WFPB. Be sure to mention why each ingredient is not WFPB.  Answer Key: White rice noodles are not WFPB because it is a highly refined grain product and is not brown rice. Beef stock, steak and fish sauce are not WFPB because they are meat and seafood products. | Free-form question and short answer.    2 other items like this  Pretest and Posttest |
| 6. Given WFPB criteria (CN), correctly (CR) identify WFPB food substitutions (B). | 4.1.1 Identify WFPB food substitutions | 6. Coconut oil adds moisture to baked goods. If a recipe calls for coconut oil when baking muffins, which of the following ingredient would be an appropriate WFPB substitute?   1. Eggs 2. Water 3. Flour 4. Apple sauce\* | Multiple choice  4 other items like this  Pretest and Posttest |
| 7. Given recipes containing non-WFPB ingredients and the WFPB substitution chart, (CN), correctly (CR) substitute non-WFPB ingredients with WFPB ingredients (B) | 4. Modify all recipes that contain non-WFPB ingredients to follow WFPB criteria  4.1 For each recipe, substitute non-WFPB ingredients with WFPB ingredients | 7. Write an appropriate WFPB substitute for the following recipe containing non-WFPB ingredients. Use the space provided to write your substitution.    *Homemade Pho Soup*  7 ounces uncooked thin white rice noodles \_\_\_\_\_\_\_\_\_\_\_\_\_\_  8 cups good-quality beef stock \_\_\_\_\_\_\_\_  2 teaspoons fish sauce \_\_\_\_\_\_\_\_\_\_\_  8 ounces raw steak\_\_\_\_\_\_\_\_\_\_\_\_\_\_  Answer Key:  7 ounces uncooked thin white rice noodles brown rice noodles  8 cups good-quality beef stock vegetable stock  2 teaspoons fish sauce soy sauce  8 ounces raw steak extra firm tofu | Short Answer  2 other items like this  Pretest and Posttest |
| 8. Terminal Objective:  Given a collection of recipes, learners will correctly modify non-WFPB recipes that adhere to the WFPB criteria | 1. Isolate recipes based on food preferences  2. Discern whether WFPB key terms are included in the recipe title  3. Classify recipes with WFPB key terms and recipes without WFPB key terms  4. Modify all recipes that contain non-WFPB ingredients to follow WFPB criteria | 8. You will be selecting three recipes based on your food preferences. With your chosen recipes, you will isolate WFPB recipes and modify non-WFPB recipes to follow the WFPB criteria.  *Stuffed Peppers*   * 6 large red, orange or yellow bell peppers * 3 tablespoons olive oil * 1 pound ground beef * 2 medium onions, chopped * 4 cloves garlic, finely grated * 2 teaspoons thyme leaves * Kosher salt and freshly ground black pepper * 4 plum tomatoes, cored and cut into 1/2-inch pieces * 2 tablespoons tomato paste * 1 cup dry white wine * 1 cup low-sodium chicken broth * 2 cups cooked white rice * 1 cup shredded Muenster cheese   *FOK Crispy Potato Vegan Cheese Sticks*   * 1 lb. Yukon gold potatoes, peeled and cut into 1-inch cubes * 1¼ cups unsweetened plant milk, such as almond, soy, cashew, or rice; divided * ¼ teaspoon agar powder * 3 tablespoons nutritional yeast, divided * 1½ teaspoon white wine vinegar * 1 teaspoon lemon juice * ½ of a small garlic clove, minced * ¼ teaspoon freshly ground black pepper, divided * 3 tablespoons arrowroot powder * ¾ cup whole grain breadcrumbs * 1 tablespoon ground flaxseeds * 1 teaspoon Italian seasoning * ¼ teaspoon paprika * 1 cup oil-free marinara sauce   *WFPB Broccoli Soup*   * 2 pounds broccoli with stems * 1⁄2 medium onion, roughly chopped * 1 leak roughly chopped * 1 small potato, scrubbed and roughly chopped * 1 cup coconut milk * 1 cup cashews (blended) * 1 teaspoon garlic powder * 2 cups fresh or frozen green peas * 1⁄8 teaspoon freshly ground black pepper * 3 tablespoons fresh lemon juice (from 1 to 2 lemons) * 1 tablespoon finely chopped fresh dill * Sea salt * ½ cup vegan cheese   *Plant Based Brown Rice with Tofu Satay*   * 1 oz scallions * ½ oz tamari or soy sauce * ¼ cup all-natural peanut butter * 1 lime * 1 oz fresh ginger (use half) * garlic (use 1 large clove) * ½ lb green beans * 1 pkg extra-firm tofu * 2 cups brown rice   *Vegan Blueberry Muffins*  1 1/4 cup unsweetened soy milk  1 teaspoon apple cider vinegar  2 cups all-purpose flour (see notes for substitutions)  1 cup granulated sugar  2 teaspoons baking powder  1/4 teaspoon salt  1 tablespoon cornstarch  1/3 cup coconut oil  1 teaspoon pure vanilla extract  1 1/2 cups fresh blueberries   1. Looking at the following recipes, isolate three recipes based on your food preferences. Use the space below to write the names of the recipe titles.    1. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_    2. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_    3. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 2. Determine which recipes are WFPB. Use the space below to write the titles of the recipes that are WFPB. There may by three or none. If there are none, write “none” below.    1. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_    2. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_    3. \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ 3. For the remaining recipes that are not WFPB recipes, modify non-WFPB ingredients by substituting the non-WFPB ingredients to follow the WFPB criteria. Use the space provided to modify the non-WFPB recipes. There may be 1-3 that need modifications.   Recipe 1:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_  Non-WFPB ingredients:  WFPB substitutes for Non-WFPB ingredients:  Recipe 2:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_  Non-WFPB ingredients:  WFPB substitutes for Non-WFPB ingredients:  Recipe 3:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_  Non-WFPB ingredients:  WFPB substitutes for Non-WFPB ingredients:  **A checklist will be provided to assess learners’ final recipes answers:**  \_\_\_ WFPB recipes have been correctly isolated. All ingredients are WFPB.  \_\_\_Non-WFPB recipes are identified  \_\_\_Non-WFPB ingredients are identified  \_\_\_Non-WFPB ingredients are correctly substituted with appropriate WFPB ingredients to follow WFPB criteria  \_\_\_Final recipes (both identified WFPB and modified recipes) follow WFPB criteria  Text  Description automatically generated | Performance Task  Only one item like this  Pretest and Posttest |

**Instructional Strategy:**

The sequence of skills to be taught in my instruction are the same as the order presented in my design evaluation chart:

1. When required to define WFPB lifestyle, correctly define a WFPB lifestyle.

2. Given a list of recipes, isolate recipes to select based on food preferences.

3. Given a list of recipe titles (CN), correctly (CR) discern whether WFPB key terms are included in the recipe titles (B).

4. Given a list of ingredients, correctly distinguish between WFPB foods and non-WFPB ingredients.

5. Given a list of recipes with WFPB key terms and recipes without WFPB key terms, correctly identify whether recipes contain non-WFPB ingredients.

6. Given WFPB criteria, correctly identify WFPB food substitutions.

7. Given recipes containing non-WFPB ingredients and the WFPB substitution chart, correctly substitute non-WFPB ingredients with WFPB ingredients.

8. Terminal Objective:

Given a collection of recipes, learners will correctly modify non-WFPB recipes that adhere to the WFPB criteria.

**Motivation:**

Since an interest in learning more about a WFPB lifestyle is a key target learner characteristic, learners should enter the learning with some degree of intrinsic motivation to incorporate more plants and whole foods and reduce the number of processed foods and animal products in their diet. I plan to motivate learners by using excerpts from scientific research done on WFPB diets to give learners context on some of the benefits of incorporating features of a WFPB lifestyle. Following the presentation of WFPB research and benefits, I will include a reflection prompt, asking learners “How can a WFPB lifestyle benefit you and help you reach your health goals?” I believe this will allow learners to reflect on individual benefits they hope to gain from learning this skill, thereby making learning more meaningful and relevant. To maintain attention, I plan to incorporate various reflection and thought questions throughout instruction. I believe incorporating opportunities throughout instruction for learners to connect their skills and knowledge to their own context and life will ensure alignment between the learning context and performance context and will motivate learners to apply their newly acquired skills. I also plan to include visual aids and summaries like the examples below to group information in meaningful ways and offer visual guides to help learners understand content.

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Excerpt from a motivational activity you are likely to use:

***Why a WFPB lifestyle?***

*Forks Over Knives—a large community of chefs, authors, doctors, and other health professionals representing an array of specialties states that:*

*“There’s excellent scientific evidence that many chronic diseases can be prevented, controlled, or even reversed with a whole-food, plant-based diet. Scientific research highlighted in the landmark book The China Study shows that a plant-based diet can reduce the risk of type-2 diabetes, heart disease, certain types of cancer, and other major illnesses” (Davison, 2022).*

*In addition to these benefits, many people following a WFPB lifestyle report that they experience greater fitness payoffs, more energy, reduced inflammation and overall, feel healthier after they made the WFPB switch (Davison, 2022).*

**Objectives:**

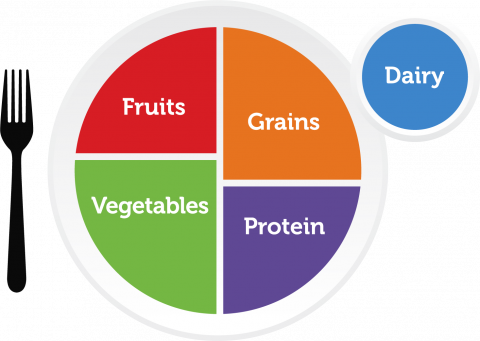
Learners will be introduced to the objectives of the instruction in the gaining attention and introduction section of the lesson so learners will know what they will be able to do upon completion of the lesson. In addition, throughout the module at the beginning of each objective section, the objective will be stated in simple terms to inform learners of the skills and content they will learn and help them focus on the section’s outcome. I plan to present the objectives as part of the introduction to each objective section, using “In this section, you will be able to” or “By the end of this unit, you will be able to.”

Example of how I will introduce learners to an objective that will appear at the beginning of a section (objective 1: Define a WFPB lifestyle):

*“In this section, you will be introduced to a WFPB lifestyle. By the end of this section, you will be able to describe the features of a WFPB lifestyle, name some WFPB food groups and distinguish between vegan and WFPB. Basically, you will have a great ‘elevator pitch’ to use when someone asks you, “What is a WFPB lifestyle?”*

**Prerequisite skills:**

In the introduction of the lesson, I plan to briefly describe the required entry skills (“Distinguish between food items in the five main food groups” and “Read recipes and ingredient lists”) learners must possess prior to instruction. In particular, recalling the five main food groups will be important to prepare learners for the skills related to WFPB food substitutions. I plan to include a visual aid to help activate learners’ recall of this information like the ones below. To review reading recipes and ingredients list, I will briefly cover a recipe format, explaining to learners that the recipe title is located at the top typically provides information on what type of meal the recipe will create and which cooking and eating needs the recipe addresses, for example ‘vegan’ or ‘low-fat.’ I will also explain that recipes include ingredient lists, indicating how much of each ingredient is required and instructions on how to make the recipe.

 Diagram

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USDA Food Guide as of 2011 HealthCanada Food Guide as of 2019

**1) When required to define WFPB lifestyle (CN), correctly (CR) define a WFPB lifestyle (B).**

**Information and Examples:**

Information in this section will include What a Whole Foods Plant Based (WFPB) lifestyle is (a definition), different features of WFPB, the WFPB food groups and a comparison between a Vegan lifestyle and a WFPB lifestyle.

***Example:***

**Definition: Key Features of a WFPB lifestyle:**

A picture containing chart

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***Example:***

Let’s look at some examples of each category:

Diagram

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**Vegan VS. WFPB**

So, what’s the difference between vegan and WFPB?

A Vegan lifestyle contains only plants (such as vegetables, grains, nuts and fruits) and foods made from plants. A Vegan lifestyle avoids foods that come from animals, including dairy products, eggs and sometimes honey. However, a vegan lifestyle can contain all grain types and refined foods like chips and candy, as long as they don’t contain animal products. Some Vegan foods tend to be highly processed and high in fat content from nuts, seeds, oils and deep fried foods.

A WFPB lifestyle is similar in containing only plants and the avoidance of animal products, however, emphasizes whole foods, whole wheat grains, minimizes nuts and seeds and avoids oils and processed foods.

***Example:***

Let’s compare and contrast a Vegan recipe and a WFPB recipe:

*Vegan Spinach and Artichoke Dip*

2 cups raw cashews

4 tsp coconut oil

4 cloves garlic finely chopped

1 onion finely chopped

1 cup baby spinach

1 can artichoke hearts (14 oz)

1 ¼ cups unsweetened almond milk

1/4 cup nutritional yeast

1 tbsp lemon juice

2 tsp miso

Salt and pepper

Serve with a toasted baguette

*WFPB Spinach and Artichoke Dip*

1¼ cups unsweetened, unflavored plant milk

1 tablespoons all-purpose or oat flour

1 teaspoon onion powder

1 teaspoon garlic powder

1 tablespoon fresh lemon juice

2 cups finely chopped spinach (fresh, or frozen and thawed)

1 (14-ounce) can artichoke hearts, drained and finely chopped (1½ cups)

Sea salt and freshly ground black pepper

Serve with carrots or a toasted whole wheat bread

In the vegan recipe, the recipe calls for a large portion of nuts, oil and is served with a white baguette. In the WFPB recipe, the recipe uses no nuts and instead substitutes the nuts with oat flour and more spinach. The WFPB recipe also suggests serving the dip with carrots or whole wheat bread, emphasizing the whole grain feature of WFPB.

**Learner Practice and Feedback:**

**Practice (only one practice item like this)**

Now it’s your turn to practice defining a WFPB lifestyle. What is a Whole Foods Plant Based lifestyle? Use the space provided to answer the following questions.

Let’s first take a look at the title itself.

* + 1. Use the space below to define “Whole Foods.”

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

* + 1. Use the space below to define “Plant Based.”

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**Feedback:**

**Whole Foods** are whole and unrefined or unprocessed foods like whole wheat and foods and foods that come from the earth. **Plant Based** are plants, including fruits, vegetables and legumes. A WFPB lifestyle emphasizes both these features.

Now let’s examine the key features of a WFPB lifestyle. When following a WFPB lifestyle, what are the key features that define it?

Use the following options to help you answer questions 3-5.

* Fruits
* Vegetables
* Oils
* Refined sweeteners
* Tubers and starchy vegetables
* Bleached flours, white bread, white rice and white pasta
* Processed foods
* Tofu and tempeh
* Plant-based milks
* Whole grains
* Legumes
* Whole nuts and seeds and nut/seed butters
* Eggs
* Meat, poultry and seafood
  + 1. In a WFPB lifestyle, what foods should you eat lots of? Use the space below to answer.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

* + 1. In a WFPB lifestyle, what foods should you eat minimally or enjoy in moderation? Use the space below to answer.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

* + 1. In a WFPB lifestyle, what foods should you avoid or minimize? Use the space below to answer.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

**Feedback:**

In a WFPB lifestyle, eat lots of fruits, vegetables, tubers and starchy vegetables, whole grains and legumes (which are ‘whole foods’), enjoy nuts, seeds, plant-based milks and tofu and tempeh in moderation (since these are high in fat and minimally processed) and avoid bleached flours, white rice and pasta, eggs, dairy, oils, meat, poultry and seafood and processed foods and refined sweeteners (which are animal products and processed foods).

Finally let’s examine the differences and similarities between Vegan and WFPB.

* + 1. Name one similarity and one difference between Vegan and WFPB. Use the space below to answer.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

**Feedback:**

The main features that define Vegan is no animal products and only plants and plant products. A WFPB lifestyle is similar in containing only plants and the avoidance of animal products. However, a vegan lifestyle can contain all grain types (white rice, pasta, bread), oils, and refined and processed foods like chips and candy. A Vegan lifestyle can be high in fat content from nuts, seeds, oils and processed foods. WFPB in contrast, emphasizes whole foods and whole grains, minimizes nuts, seeds, plant-milk and tofu/tempeh and avoids oils and processed foods.

**2) Given a list of recipes (CN), isolate recipes to select (B) based on food preferences (CR).**

**Information and Examples:**

In the second objective, learners will be asked to review provided recipes included in the lesson, reflect on their food preferences and select recipes that they will be examining (isolating WFPB recipes and modifying non-WFPB recipes) throughout the entire lesson. Information will be provided on reviewing recipes and naming food preferences.

“When dinner is made for you and you don’t like one of the foods that’s for dinner, do you enjoy eating it?

Food preferences are attitudes—likes and dislikes—people hold towards food that influence their food choices. Food preferences play an important role since they are a large determinant of dietary intake. Food preferences develop in our childhood, sometimes as early as in utero, but they can change throughout our lifetime. When isolating recipes, it is important to follow your food preferences so you are choosing recipes you like and can envision yourself making.

How can you isolate recipes based on your food preferences?

First, we need to review the recipes. This involves looking at the recipe title and ingredients and seeing if there are any ingredients or flavors you would not enjoy eating.

1. Review the recipe. Do a quick read of the recipe title and ingredients.
2. Reflect on your food preferences.
3. Decide whether you would like to eat the meal or not.
4. Isolate the recipes you like by drawing an asterisk by the recipe title.

Keep in mind that some of these recipes will need to be modified to follow WFPB criteria. Reflect on the overall flavor of the recipe and whether the flavor aligns with your food preferences.



Example: Let’s take a look at an example of how Maria reviews a recipe and names their food preferences.

*Maria is hoping to isolate recipes based on her food preferences for a meal she is planning to make.*

*1. Maria first reviews the recipe by doing a quick read of the recipe title and ingredients*

*Recipe: Avocado Chocolate Pudding*

2 large avocados - peeled, pitted, and cubed

½ cup unsweetened cocoa powder

¼ cup mint

½ cup brown sugar

⅓ cup coconut milk

2 teaspoons vanilla extract

1 pinch ground cinnamon

*2. Maria reflects on her food preferences.*

She enjoys sweets and the creaminess of avocado. However, she does not enjoy chocolate.

3. *Maria decides that she would not enjoy eating the meal since the overall recipe flavor is chocolate.*

4. *Maria does not draw an asterisk by the recipe title. She continues to look for other recipes to isolate for her meal.*

**Learner Practice and Feedback:**

**Practice: (one other practice item like this)**

Review the following recipe titles and ingredients, draw an asterisk by the recipes you would enjoy making or modifying to follow WFPB living. Use the space provided to answer the question with either a yes or no response.

**1. Review the recipe. Do a quick read of the recipe title and ingredients**

*Low Free Vegan Bean Enchilada Recipe*

Whole wheat or corn tortillas

1 large onion

2 medium-large potatoes

16 oz. of your favorite beans, rinsed and drained

1-2 zucchinis

1 cup fresh or frozen corn

2 tsp of your favorite all-purpose seasoning

1 cup fresh cilantro

2 cups enchilada sauce

2 cups fat free spaghetti sauce

**2. Reflect on your food preferences.**

a. Ask yourself, do you like Mexican food? \_\_\_\_\_\_\_\_\_\_\_\_\_

b. Do you like enchiladas? \_\_\_\_\_\_\_\_\_\_\_\_\_

c. Do you like the ingredients listed? \_\_\_\_\_\_\_\_\_\_\_\_\_

**3. Decide whether you would like to eat the meal or not.**

Ask yourself, would you enjoy eating the meal? \_\_\_\_\_\_\_\_\_\_\_\_

**4. Isolate the recipes you like by drawing an asterisk by the recipe title.**

If yes, place an asterisk by the recipe title.

**Feedback:**

2. If your answer to a. and b. is “Yes,” you will likely enjoy eating the meal. If your answer to c. is no, ask yourself if it is an ingredient that can easily be substituted for something else. However, if your answer to a. and b. is no, you will likely not enjoy eating the meal.

3. If your answer is “Yes,” you should place an asterisk beside the recipe title. If your answer is no, do not place an asterisk.

**3) Given a list of recipe titles (CN), correctly (CR) discern whether WFPB key terms are included in the recipe titles (B).**

**Information and Examples:**

Information in this objective will include key terms that are strictly WFPB and key terms that are related to WFPB.

Recipe titles provide information on what type of meal the recipe will create and also which cooking and eating needs the recipe addresses. When recipe hunting, reviewing recipes and modifying recipes, it is essential to know the key terms that are strictly associated with WFPB. Key terms—which typically appear in recipe titles—describe what eating and lifestyle needs the recipe meets.

There are two general categories of key terms: “Strictly WFPB” key terms that describe exactly a WFPB lifestyle and “Related WFPB” key terms that are closely related to WFPB, but do not always meet all of the WFPB criteria.

Why is it important to know the two categories?

A WFPB lifestyle is a less known eating and cooking choice and it is a fairly new lifestyle. As a result, there are less WFPB recipes available and strictly WFPB recipes can be limited. Therefore, using Related WFPB key terms can greatly increases your options for WFPB recipes because they will likely contain a greater amount of WFPB ingredients in the recipe and the non-WFPB ingredients can be easily modified to meet WFPB criteria. These Related WFPB key terms are not considered strictly WFPB but are helpful in determining how many substitutions you will need to do in a recipe.

***Examples:***

**Strictly WFPB key terms:**

Whole Foods Plant Based (WFPB)

Forks Over Knives (FOK)

Whole Foods

Plant-Based

It is important to learn the abbreviations for Whole Foods Plant Based and Forks Over knives, since these key terms are often abbreviated in recipe titles.

**Related WFPB key terms:**

Vegan

Heart Healthy

Fat-free

Oil-Free

While knowing related WFPB key terms is very helpful in the modification of recipes to follow the WFPB criteria, when discerning whether WFPB key terms are included in the recipe titles or not, it is important to identify WFPB recipes that only contain Strictly WFPB key terms.

**Learner Practice and Feedback:**

**Practice:** **(one other practice item like this)**

Let’s practice identifying Strictly WFPB and related WFPB key terms in recipe titles.

1. Match the following key terms to their category. Key terms can either be “Strictly WFPB,” Related WFPB” or “Neither.” “Neither” indicates that the key terms have no associating to WFPB key terms. Answers may be used more than once.

*Recipe Titles Key Terms*

\_\_\_\_Fat-Free Lasagna a. Strictly WFPB

\_\_\_\_WFPB Sweet Potato Bread b. Related WFPB

\_\_\_\_Vegetarian Pasta and Meat Balls c. Neither

\_\_\_\_Oil-Free Roasted Garlic

\_\_\_\_Meatless Clam Chowder

\_\_\_\_Forks Over Knives Gluten-Free Jalapeño Poppers

\_\_\_\_Heart Healthy Hummus Dip

\_\_\_\_Gluten-Free Pizza

\_\_\_\_Vegan Pad Thai

\_\_\_\_Plant Based Vegetable Noodle Soup

1. From the above list of recipe titles, which recipes can be identified as WFPB recipes? Use the space below to answer the question. Note that you may not need to use all the lines provided.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Feedback:**

*Recipe Titles Key Terms*

\_\_b\_\_Fat-Free Lasagna a. Strictly WFPB

\_\_a\_\_WFPB Sweet Potato Bread b. Related WFPB

\_\_c\_\_Vegetarian Pasta and Meat Balls c. Neither

\_\_b\_\_Oil-Free Roasted Garlic

\_\_c\_\_Meatless Clam Chowder

\_\_a\_\_Forks Over Knives Gluten-Free Jalapeño Poppers

\_\_b\_\_Heart Healthy Hummus Dip

\_\_c\_\_Gluten-Free Pizza

\_\_b\_\_Vegan Pad Thai

\_\_a\_\_Plant Based Vegetable Noodle Soup

1. WFPB Sweet Potato Bread

Forks Over Knives Gluten-Free Jalapeño Poppers

Plant Based Vegetable Noodle Soup

Sometimes, recipes will use more than one key term, as seen with “Forks Over Knives Gluten-Free Jalapeño Poppers.” As long as it has one of the Strictly WFPB key terms in the recipe, you can identify it as a WFPB recipe. Keep in mind that when a recipe title used Related WFPB key terms, the recipes is not considered WFPB, but may be easier to modify than a recipe that does not contain Related WFPB key terms.

**4) Given a list of ingredients, correctly distinguish between WFPB foods and non-WFPB ingredients.**

**Information and Examples:**

Information in this objective will include the WFPB criteria that indicates whether a food item is WFPB or non-WFPB. Information will also include how to recognize store bought ingredients on a recipe which may include non-WFPB ingredients.

Building on what we learned about the WFPB features, let’s explore WFPB and non-WFPB food items. Summarized in the WFPB Criteria, we can see an overview of the food items that are WFPB and food items that are non-WFPB.

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**How to tell if an ingredient is store bought:**

Not all ingredients in a recipe will be made from scratch, sometimes, recipes call for store-bought products, for which you have no idea what they may contain. Recipes often contains an ingredient like a salad dressing, that contains multiple ingredients—but those ingredients may not be listed and determining whether the ingredient is WFPB can be tricky. Recipes may indicate an ingredient is store bought by placing the word “store-bought” in front of it or listing a brand name. Other times, if an ingredient is listed, for example “balsamic vinaigrette” and there is no recipe included for that ingredient, it can be considered store-bought.

Store-bought ingredients are complex because they may include non-WFPB ingredients. Below if an example of a pasta sauce that contains non-WFPB ingredients. A picture containing text, indoor

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When you encounter an ingredient on a recipe that is store bought, mark these as non-WFPB ingredients, since they can be substituted fairly easily to follow WFPB ingredients.

Step 1: Determine if there is an ingredient listed that actually contains other ingredients.

Step 2: Determine if the recipe uses the word “store-bought” or includes a brand name

Step 3: Determine if there is a recipe included for that ingredient.

Step 4: If the ingredient is confirmed as ‘store-bought’ mark these as non-WFPB



**Example:**

Let’s take a look at how Maria determines if an ingredient is store bought:

*Homemade Veggie Pizza*

1 store-bought pizza shell

1 cup pizza sauce or marinara

2 cups baby spinach

2 to 3 cups shredded low-moisture part-skim mozzarella cheese

½ cup jarred artichokes in oil

½ cup fresh red or orange bell pepper

½ cup red onion, cut into thin wedges

½ cup halved cherry tomatoes

½ cup pitted Kalamata olives, halved lengthwise

Fresh basil

**Step 1: Determine if there is an ingredient listed that actually contains other ingredients.**

Maria reads the recipe ingredients. She notices that the recipe calls for a “pizza shell” and a “pizza sauce or marinara sauce” which both contain other ingredients.

**Step 2: Determine if the recipe uses the word “store-bought” or includes a brand name**

She notices that the pizza shell uses “store-bought,” but the pizza sauce does not contain “store-bought or a brand name.

**Step 3: Determine if there is a recipe included for that ingredient.**

Maria examines the whole recipe and determines there are no recipes included for the pizza shell or pizza sauce.

**Step 4: If the ingredient is confirmed as ‘store-bought’ mark these as non-WFPB**

Maria determines that both ingredients are considered store-bought. She marks these two ingredients as non-WFPB by placing an asterisk by the ingredients.

*Homemade Veggie Pizza*

1 store-bought pizza shell\*

1 cup pizza sauce or marinara \*

2 cups baby spinach

2 to 3 cups shredded low-moisture part-skim mozzarella cheese

½ cup jarred artichokes in oil

½ cup fresh red or orange bell pepper

½ cup red onion, cut into thin wedges

½ cup halved cherry tomatoes

½ cup pitted Kalamata olives, halved lengthwise

Fresh basil

**Example:**

Recipes may contain both WFPB ingredients and non-WFPB ingredients. Now that we have learned how to determine whether an ingredient is store-bought, let’s take a look at a recipe and practice distinguishing between WFPB ingredients and non-WFPB ingredients.

*Homemade Veggie Pizza*

1 store-bought pizza shell

1 cup pizza sauce or marinara

2 cups baby spinach

2 to 3 cups shredded low-moisture part-skim mozzarella cheese

½ cup jarred artichokes in oil

½ cup fresh red or orange bell pepper

½ cup red onion, cut into thin wedges

½ cup halved cherry tomatoes

½ cup pitted Kalamata olives, halved lengthwise

Fresh basil

The highlighted ingredients are the non-WFPB ingredients. Let’s explore why.

* 1 store-bought pizza shell: Store-bought pizza crust will be a refined grain and made with bleached flour.
* 1 cup pizza sauce or marinara: Pizza or marinara sauces typically contain added oils or may contain added cheese.
* 2 to 3 cups shredded low-moisture part-skim mozzarella cheese: Cheese is a dairy product.
* ½ cup jarred artichokes in oil: Artichokes are preserved in oil, which means they contain oil.

**Learner Practice and Feedback:**

**Practice:** **(two other practice items like this)**

1. Look at the ingredients in the following recipe and match the ingredients to the categories of WFPB and non-WFPB. Choices may be used more than once.

*Easy Vegan Dumplings*

*Ingredients Categories*

\_\_\_\_30-36 **gyoza/ dumpling/ wonton wrappers**  a. WFPB

\_\_\_\_6 tbsp **vegetable oil** b. Non-WFPB

\_\_\_\_1 cup **cabbage** (shredded in food processor)

\_\_\_\_1 cup **carrot** shredded

\_\_\_\_2 cups **mushrooms** (finely chopped)

\_\_\_\_3/4 cup firm or extra firm **tofu** (crumbled)

\_\_\_\_2 tsp **ginger** (grated)

\_\_\_\_2 tsp **garlic** (grated)

\_\_\_\_2 tbsp **soy sauce**

\_\_\_\_2 tbsp **sriracha sauce**

\_\_\_\_1 tbsp **sesame oil**

2. Write the following Non-WFPB ingredients you identified below. Use the space provided to list why they are not WFPB. You may not need to use all the spaces provided.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

**Feedback:**

*Easy Vegan Dumplings*

*Ingredients Categories*

\_\_b\_\_30-36 **gyoza/ dumpling/ wonton wrappers**  a. WFPB

\_\_b\_\_6 tbsp **vegetable oil** b. Non-WFPB

\_\_a\_\_1 cup **cabbage** (shredded in food processor)

\_\_a\_\_1 cup **carrot** shredded

\_\_a\_\_2 cups **mushrooms** (finely chopped)

\_\_a\_\_3/4 cup firm or extra firm **tofu** (crumbled)

\_\_a\_\_2 tsp **ginger** (grated)

\_\_a\_\_2 tsp **garlic** (grated)

\_\_a\_\_2 tbsp **soy sauce**

\_\_a\_\_2 tbsp oil-free **sriracha sauce**

\_\_b\_\_1 tbsp **sesame oil**

2.

30-36 **gyoza/ dumpling/ wonton wrappers: Wonton wrappers are store bought and may be a refined grain**

6 tbsp **vegetable oil**: This is an oil

1 tbsp Sesame oil: This is an oil

**5) Given a list of recipes with WFPB key terms and recipes without WFPB key terms, correctly identify whether recipes contain non-WFPB ingredients.**

**Information and Examples:**

Information in this section will include why recipes with WFPB key terms still need to be checked for all WFPB ingredients and how to identify whether recipes contain non-WFPB ingredients.

Why double check a recipe for non-WFPB ingredients the recipe uses a WFPB key term?

Recipes may use a key term in the title, but the ingredients may not always reflect the key term descriptor. Unfortunately, recipes with WFPB key terms do not guarantee that all the ingredients will be WFPB. Firstly, there are variations in the definitions of whole food plant based and the lifestyle can be a spectrum—the strictness of following WFPB varies. The avoidance of oil in particular, is not always a shared practice for WFPB living, but is emphasized in the Forks Over Knives WFPB lifestyle. Secondly, sometimes the recipe authors include the title, not understanding or having different definitions of WFPB. Therefore, it is best practice to always review the recipe’s ingredients even if WFPB key terms are used in the title.

Let’s review the ‘Strictly WFPB’ key terms we have learned:

* Whole Foods Plant Based (WFPB)
* Forks Over Knives (FOK)
* Whole Foods
* Plant-Based

Example:

Let’s take a look at an example of a time where a recipe uses the WFPB key term, but the recipe contains non-WFPB ingredients

*Plant-Based Tacos with Smoky Chipotle Portobellos*

* 2 extra large portobello mushrooms
* 1 red bell pepper
* ½ an onion – optional
* 1 tablespoon oil
* ½ teaspoon Chipotle pepper
* 1 minced garlic clove
* ½ teaspoon coriander
* salt to taste
* 4 tortillas, warmed
* 1 can refried black beans, warmed
* Dairy free sour cream to top

While this recipe uses the WFPB key term, “plant-based,” it contains oil and dairy-free sour cream (which is considered a processed food item). Therefore, the recipe contains two non-WFPB ingredients.

**Learner Practice and Feedback:**

**Practice:** **(one other practice item like this)**

Let’s practice. Look at the recipe.

*WFPB Peanut Buddha Bowls*

**Sauce**

* 3 tablespoons rice vinegar
* 1½ tablespoons honey
* 1 tablespoon tamari or soy sauce
* 1 teaspoon sesame oil
* 2 tablespoons peanut butter

**Bowls**

* 2 cups brown rice
* 1 tablespoon sesame oil, divided
* 3 cups sliced shiitake mushrooms
* 2 tablespoons tamari or soy sauce
* 5 ounces baby spinach
* 1 garlic clove, minced
* 2 tablespoons rice vinegar
* 1 cup bean sprouts
* 1 cup julienned cucumber
* 1 cup julienned carrots

1. Does the WFPB recipe include non-WFPB ingredients? Choose one option.

1. Yes
2. No

2. If yes, in the space provided, list the non-WFPB ingredients. list the ingredients. You may not use all the space provided.

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Feedback:**

**1.** Yes. While the recipe used “WFPB,” the recipe still contained non-WFPB ingredients.

**2.** Sesame oil is the only non-WFPB ingredient used.

**6) Given WFPB criteria, correctly identify WFPB food substitutions.**

**Information and Examples:**

Information in this section will include common WFPB food substitutions and which substitutions work best depending on the non-WFPB ingredient type.

Luckily, there is a large variety of WFPB substitutions to use when a recipe contains non-WFPB substitutions. First you have to learn the WFPB substitutions, then decide what WFPB substitution will work best depending on the recipe and your food preferences. In this section, you will be learning WFPB food substitutions.

When it comes to WFPB substitutions, it is important to note that the substitutions will not taste exactly like the non-WFPB ingredient. It is important to have an open mind.

WFPB Substitutions Chart

|  |  |
| --- | --- |
| **Non-WFPB Ingredient** | **WFPB Substitution** |
| Milk | * Any plant milk: Almond, cashew, macadamia, oat, soy, coconut * Sometimes, water will be enough to substitute milk |
| Meat, Poultry, Seafood and Fish | * Beans (a good source of protein) * Tofu or tempeh (minimal) * Seitan (a low-fat, protein-packed, meat-alternative derived from wheat; takes on whatever flavor you are making) * Young jackfruit in a can works well for shredded pork or chicken texture * Cauliflower works well when substituting for ground meat or chicken * For sausages and hot dogs, marinated carrots work well * For burger patties, vegetable patties work well * Other vegetables or adding more vegetables |
| Beef or Chicken Broth | * Vegetable broth |
| Eggs | For baking:   * Ground flaxseed with 2 ½ tablespoons of water and let sit 10 minutes before using * Chia seed with 3 tablespoons water and let sit for 15 minutes before using * Applesauce * Mashed banana * Silken tofu * Chickpea flour with 3 * Cornstarch with 3 Tbsp water * Arrowroot powder with 3 Tbsp water * Agar powder with 3 Tbsp water * Unwhipped aquafaba (juice from a can of chickpeas)   For Savory Recipes:   * Extra firm tofu (for scrambled egg effect) * Chickpeas (mashes or whole) * Hing (Indian spice that smells like boiled eggs) * Ground flaxseed with 2 ½ tablespoons of water and let sit 10 minutes before using |
| Butter & Oils | For Sauteing Vegetables or Cooking:   * Vegetable broth * Soy sauce * More of another sauce the recipe calls for (oil-free and sugar-free barbeque sauce or vegan Worchester sauce, etc.) * In some cases, water will be enough to substitute oil   Gravy:   * Corn starch (thickens up the gravy) * Arrowroot powder (thickens up the gravy)   For baking or sweet recipes:   * **Bananas (blended)** * **Applesauce** * **Prune puree** * **Nut butter (in minimal amounts)** * **Chickpea (for a thicker substitute)** |
| Mayonnaise | * Silken tofu blended with plant milk and vinegar and spices |
| Cheese | * For parmesan, nutritional yeast works well * To mimic a cheesy taste, use nutritional yeast * For a cheese sauce or queso, use silken tofu and spices * For cheese sauce, use a cooked, mashed and blended potato to thicken up sauces and make them creamy * For creamier sauces, use minimal nuts (blended) |
| Refined Grains: White breads, white rice, flour tortillas | * Whole wheat bread, pita and wraps * Brown rice or other whole wheat grains (quinoa, millet, whole wheat couscous, barley) * Oil-free corn tortillas |
| All-Purpose Flour | * Whole wheat flour * Oat flour |
| Fried Vegetables | * Whole wheat breadcrumbs or a whole wheat batter and baking in the oven * French fries- use corn starch and vegetable broth, season and bake or use an air fryer (with no oil) |
| Marinara or Pizza Sauce | * Look for an oil free store-bought option or make a marinara or pizza sauce homemade with no oil or sugar. |
| Pizza Crust/Shell | * Homemade pizza shell using whole wheat flour |

**Example:**

Let’s take a look at the following recipe ingredients. The non-WFPB ingredients are highlighted.

Blueberry Muffins:

* 1 cup of all-purpose flour
* 1/2 teaspoon of baking soda
* 1 teaspoon of baking powder
* Pinch of salt
* 2 eggs
* 1/2 teaspoon of cinnamon
* 1/4 cup of maple syrup
* 1/2 cup of almond milk
* 1 teaspoon of vanilla extract
* 1 medium banana, mashed
* 1/2 cup blueberries

For the all-purpose flour, what would be a WFPB substitute?

* White flour
* Whole wheat flour
* Oat flour
* Bread flour

Looking at our WFPB substitution chart, there are two substitutions that are WFPB, whole wheat flour and oat flour, the other two are considered refined flours.

For the eggs, what would be a WFPB substitute?

* Mashed banana
* Butter
* Coconut or vegetable Oil
* Apple sauce

Butter and oil are not WFPB. A mashed banana and apple sauce would be WFPB substitutes.

**Practice and Feedback:**

**Practice:** **(one other practice item like this)**

Let’s practice identifying appropriate WFPB food substitutions

Take a look at the following recipe and select the appropriate WFPB substitution. More than one choice may be selected.

*Texas Pulled Pork*

Pulled Pork:

* 1 teaspoon vegetable oil
* 1 (4 pound) pork shoulder roast
* 1 cup barbeque sauce
* ½ cup apple cider vinegar
* ½ cup chicken broth
* 1 tablespoon prepared yellow mustard
* 1 tablespoon Worcestershire sauce
* 1 tablespoon chili powder
* 1 extra large onion, chopped
* 2 large cloves garlic, crushed
* 1 ½ teaspoons dried thyme
* 8 white hamburger buns, split

1. Which of the following ingredient would be an appropriate WFPB substitute for vegetable oil?

1. Barbeque sauce
2. Water
3. Vegetable broth
4. Butter

2. Which of the following ingredient would be an appropriate WFPB substitute for pork shoulder roast?

1. Tofu
2. Chicken
3. Canned Young Jackfruit
4. Beans

3. Which of the following ingredient would be an appropriate WFPB substitute for chicken broth?

1. Soy sauce
2. Water
3. Oil
4. Vegetable broth

4. Which of the following ingredient would be an appropriate WFPB substitute for white hamburger buns?

1. Whole wheat hamburger buns
2. Sourdough bread buns
3. Rye bread buns
4. Ciabatta buns

**Feedback:**

1. The correct answer is a, b, and c. Oil can be substituted with vegetable broth or water easily, or can be substituted by using another sauce the recipe calls for. Barbeque sauce in this case, makes sense too. Any of these choices would be an appropriate WFPB substitution.
2. For pork shoulder roast, the correct answer is c. and d. Canned jackfruit has the perfect texture for shredded pork, you can also substitute the pork for beans.
3. For chicken broth, the correct answer is d. Substituting vegetable broth is an appropriate choice because it would not change the recipe too much.
4. For white hamburger buns, the correct answer is a. Whole wheat buns are the only WFPB substitution from the following choices. The other choices are refined grains.

**7) Given recipes containing non-WFPB ingredients, correctly substitute non-WFPB ingredients with WFPB substitutes.**

**Information and Examples:**

Information in this section will include using the WFPB substitutions and correctly substituting the non-WFPB ingredients with WFPB substitutes to modify a non-WFPB recipe to follow the WFPB criteria.

In the last section, we learned the WFPB substitutions and practiced identifying them. In this section, we will learn how to decide what WFPB substitution will work best depending on the recipe and your food preferences. You will be modifying an entire recipe to follow the WFPB criteria.

Example

**Example: Let’s explore how to substitute the following recipe.**

Let’s take a look at the following recipe ingredients:

*Plant-Based Tacos with Smoky Chipotle Portobellos*

* 2 extra large portobello mushrooms
* 1 red bell pepper
* ½ an onion – optional
* 1 tablespoon oil
* 2 tablespoons canned Chipotle in Adobo sauce
* 1 minced garlic clove
* ½ teaspoon coriander
* salt to taste
* 4 flour tortillas, warmed
* 1 can refried black beans, warmed
* Dairy free sour cream to top

**1 tablespoon oil:**

Since this recipe is savory, the most appropriate WFPB substitutes would be either water or vegetable broth to cook the vegetables. Since the recipe involves Tacos, perhaps oil free fajita or enchilada sauce can be substituted.

**4 flour tortillas:**

The four tortillas would be substituted with whole wheat wraps or corn tortillas.

**1 can refried black beans:**

The refired beans are likely store-bought and may contain oil. An appropriate substitute would be fat-free refired beans or black beans.

**Dairy free sour cream to top**

The sour cream can be substituted for another topping, for example salsa or guacamole, or could be substituted with blended silken tofu.

**Learner Practice and Feedback:**

**Practice:** **(two other practice items like this)**

Modify the following recipe to follow the WFPB criteria. Look at the following recipe and substitute the non-WFPB ingredients for appropriate WFPB substitutes. Mark the non-WFPB ingredients with an asterisk. Use the space provided to write the WFPB substitute.

**Egg Salad Sandwiches**

8 eggs hard boiled and cooled \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

½ cup mayonnaise \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

1 ½ teaspoons yellow mustard \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

1 green onion thinly sliced \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

1 rib celery finely diced \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

2 teaspoons fresh dill chopped \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Serve on white bread \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

**Feedback:**

**Egg Salad Sandwiches**

\*8 eggs hard boiled and cooled

Eggs can be substituted for tofu or chickpeas. The Indian hing seasoning can be used to mimic the “boiled egg” smell and taste.

\*½ cup mayonnaise

Mayonnaise can be substituted for silken tofu blended with plant milk, vinegar and spices (dry mustard powder, onion powder, garlic powder, salt)

\*Serve on white bread

Serve on whole wheat bread.

**8) Terminal Objective: Given a collection of recipes, learners will correctly modify non-WFPB recipes that adhere to the WFPB criteria.**

**Information and Examples:**

Information in this section will include a review of all the required steps and how to put all the steps together to perform the terminal objective.

Throughout the lesson, you learned how to isolate recipes based on your food preferences, isolate recipes based on WFPB key terms and substitute non-WFPB ingredients with WFPB substitutes so all chosen recipes follow the WFPB criteria.

Let’s look at how to put the steps together:

1) Isolate recipes based on food preferences.

1. Review the recipe. Do a quick read of the recipe title and ingredients.
2. Reflect on your food preferences.
3. Decide whether you would like to eat the meal or not.
4. Isolate the recipes you like by drawing an asterisk by the recipe title

2) Isolate WFPB recipes

1. Discern whether WFPB key terms are included in the recipe titles
2. Identify whether recipes contain non-WFPB ingredients.

3) For the recipes containing non-WFPB ingredients, correctly substitute non-WFPB ingredients with WFPB substitutes

**Example:** Let’s take a look at how Maria applies the steps:

**1. Maria is given 3 recipes. She is asked to choose 2 based on her food preferences by drawing an asterisk by the recipe title.**

*\*Traditional Spaghetti and Meatballs*

1 jar parmesan spaghetti sauce

1 pound beef meat balls

3 Tbsp Light olive oil

1 pound spaghetti

2 Tbsp basil, finely minced

Salt & pepper to taste

*\*FOK No Bake Peanut Butter Granola Bars*

1 tablespoon ground flaxseed mixed with 1/4 cup warm water

1 cup brown rice crisp cereal (non-sweetened)

1 cup quick cooking oats

1 tablespoon tapioca starch

1/2 cup all-natural creamy peanut butter with no additives

1/2 cup pure maple syrup

1 teaspoon vanilla extract

Vegan *Eggplant Stir-Fry*

1 large eggplants, diced

1/2 cup vegetable broth for sauteing veggies

1 medium onions, sliced

2 cloves garlic, chopped

1 medium carrots, peeled and chopped

1 medium red bell pepper, sliced

1 medium green bell pepper, sliced

1/4 teaspoon cayenne pepper powder

1 tablespoon sesame oil

2 tablespoons Tamari or soy sauce

1 teaspoon black pepper, optional

2 cups white rice

Reflecting on her good preferences, Maria loves spaghetti and meatballs and peanut butter, however, she does not like eggplant which is a main ingredient in the stir-fry.

**2. Discern whether WFPB key terms are included in the recipe titles**

**From the above recipes, discern which recipes contain WFPB key term. Write the recipe title(s) below. You may not need to use all the spaces provided.**

From the two recipes Maria chose, she identifies FOK as a WFPB key term:

***FOK*** *No Bake Peanut Butter Granola Bars*

**3. Identify whether recipes contain non-WFPB ingredients. Substitute the non-WFPB ingredients for WFPB ingredients.**

Recipe 1: *FOK No Bake Peanut Butter Granola Bars*

Non-WFPB ingredients:

Maria reads the ingredients and concludes that this recipe contains all WFPB ingredients.

WFPB substitutes for Non-WFPB ingredients:

No substitutions or modifications for this recipe will be necessary.

Recipe 2: *Traditional Spaghetti and Meatballs*

Non-WFPB ingredients:

Maria reads the ingredient list and identifies the following non-WFPB ingredients:

* 1 jar parmesan spaghetti sauce
* 1 pound beef meat balls
* 3 Tbsp Light olive oil
* 1 pound spaghetti

WFPB substitutes for Non-WFPB ingredients:

**1 jar parmesan spaghetti sauce**

For the 1 jar parmesan spaghetti sauce, Maria determines that this item is store-bought and contains other ingredients. Since the title says “parmesan” she notes that it is no WFPB and will need to be substituted. Maria substitutes an oil-free vegan spaghetti sauce.

**1 pound beef meat balls**

Maria substitutes the beef meat balls for veggie meatballs made from vegetables and quinoa.

**3 Tbsp Light olive oil**

Maria substitutes the olive oil for vegetable broth, so the noodles wont; be dry or stick together.

**1 pound spaghetti**

Maria substitutes the spaghetti with whole wheat spaghetti.

Maria rewrites the modified recipe and includes the WFPB recipe below:

*\*WFPB Spaghetti and Meatballs*

1 jar oil-free vegan spaghetti sauce

1 pound vegetable meat balls

3 Tbsp vegetable broth

1-pound whole wheat spaghetti

2 Tbsp basil, finely minced

Salt & pepper to taste

*\*FOK No Bake Peanut Butter Granola Bars*

1 tablespoon ground flaxseed mixed with 1/4 cup warm water

1 cup brown rice crisp cereal (non-sweetened)

1 cup quick cooking oats

1 tablespoon tapioca starch

1/2 cup all-natural creamy peanut butter with no additives

1/2 cup pure maple syrup

1 teaspoon vanilla extract

**Maria uses the checklist to see how she did.**

Yes WFPB recipes have been correctly isolated. All ingredients are WFPB.

Yes Non-WFPB recipes are identified

Yes Non-WFPB ingredients are identified

Yes Non-WFPB ingredients are correctly substituted with appropriate WFPB ingredients to follow WFPB criteria

Yes Final recipes (both identified WFPB and modified recipes) follow WFPB criteria:

Recipe Ingredients:  **Yes No**

1. Lots of vegetables, fruits, legumes, whole grains \_√\_\_ \_\_\_
2. Meats/Poultry \_\_\_ \_√\_
3. Seafood \_\_\_ \_√\_
4. Eggs & Dairy \_\_\_ \_√\_
5. Oils \_\_\_ \_√\_
6. Processed & Highly Refined Foods \_\_\_ \_√\_

(sugar, candy, chips, crackers, white bread

and rice)

1. Minimal nuts, seeds, plant milk, tofu and tempeh \_√\_\_ \_\_\_

**Learner Practice and Feedback:**

**Practice (only one practice item like this):**

Now it’s time to practice putting it all together.

**1. From the following 6 recipes. Choose three based on your food preferences by drawing an asterisk by the recipe title.**

*Traditional Spaghetti and Meatballs*

1 jar parmesan spaghetti sauce

1 pound beef meat balls

3 Tbsp Light olive oil

1 pound spaghetti

2 Tbsp basil, finely minced

Salt & pepper to taste

*Plant-Based Artichoke and Pasta Salad*

1 package cooked white rotini pasta

2 cups artichokes in oil

1 cup finely chopped red onions

3-4 large tomatoes diced

2 cups chopped parsley

¼ cup vegan feta cheese

Dressing:

2 lemons squeezed (juice)

2 tbsp tahini

6 tbsp olive oil

1 tsp chopped garlic

2 tbsp red wine vinegar

3 tbsp dried oregano

*Blueberry Overnight Oats*

½ cup (50 g) rolled oats

½ cup skim milk

¾ tbsp pure maple syrup

¼ teaspoon pure vanilla extract

¼ cup (25 g) fresh or frozen blueberries

¼ cup (25 g) fresh blueberries

*Stuffed Peppers*

6 large red, orange or yellow bell peppers

3 tablespoons olive oil

1 pound ground beef

2 medium onions, chopped

4 cloves garlic, finely grated

2 teaspoons thyme leaves

Kosher salt and freshly ground black pepper

4 plum tomatoes, cored and cut into 1/2-inch pieces

2 tablespoons tomato paste

1 cup dry white wine

1 cup low-sodium chicken broth

2 cups cooked white rice

1 cup shredded Muenster cheese

*Fat-Free Lentil Soup*

3 medium carrots, cut into 1/4-inch pieces

1 medium onion, diced

1 large celery stalk (about 2 ounces)

Kosher salt and freshly ground black pepper

2 tablespoons tomato paste

1 large clove garlic, minced

1 1/2 cups dried brown lentils

4 cups beef broth

7 sprigs thyme, leaves stripped

1/2 teaspoon dried oregano

1/4 teaspoon crushed red pepper flakes

1 teaspoon lemon zest, plus the juice of 1/2 lemon (about 2 tablespoons)

1/2 cup flat-leaf parsley leaves

*Forks Over Knives Spicy Tomato Sushi Rolls*

1½ cups low-sodium vegetable broth

¾ cup dry short grain brown rice

1½ cups frozen riced butternut squash

4 roma tomatoes, seeded and chopped (2 cups)

1 tablespoon reduced-sodium tamari

1 teaspoon grated fresh ginger

1 tablespoon sriracha sauce

2 teaspoons tahini

2 tablespoons brown rice vinegar

1 tablespoon pure maple syrup

4 8-inch toasted nori sheets

½ of a medium avocado, peeled and sliced

1 cucumber, seeded and cut lengthwise

2 carrots, coarsely shredded (1 cup)

scallions

**2. Discern whether WFPB key terms are included in the recipe titles**

**From the above recipes, discern which recipes contain WFPB key term. Write the recipe title(s) below. You may not need to use all the spaces provided.**

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

3. Identify whether recipes contain non-WFPB ingredients. Substitute the non-WFPB ingredients for WFPB ingredients.

Recipe 1:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Non-WFPB ingredients:

WFPB substitutes for Non-WFPB ingredients:

Recipe 2:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Non-WFPB ingredients:

WFPB substitutes for Non-WFPB ingredients:

Recipe 3:\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Non-WFPB ingredients:

WFPB substitutes for Non-WFPB ingredients:

**Feedback:**

**Use the checklist to see how you did. Write a yes or no in front of the criteria. For the WFPB criteria, check the application column (yes/no).**

\_\_\_WFPB recipes have been correctly isolated. All ingredients are WFPB.

\_\_\_Non-WFPB recipes are identified

\_\_\_Non-WFPB ingredients are identified

\_\_\_Non-WFPB ingredients are correctly substituted with appropriate WFPB ingredients to follow WFPB criteria

\_\_\_Final recipes (both identified WFPB and modified recipes) follow WFPB criteria:

Recipe Ingredients:  **Yes No**

1. Lots of vegetables, fruits, legumes, whole grains \_\_\_ \_\_\_
2. Meats/Poultry \_\_\_ \_\_\_
3. Seafood \_\_\_ \_\_\_
4. Eggs & Dairy \_\_\_ \_\_\_
5. Oils \_\_\_ \_\_\_
6. Processed & Highly Refined Foods \_\_\_ \_\_\_

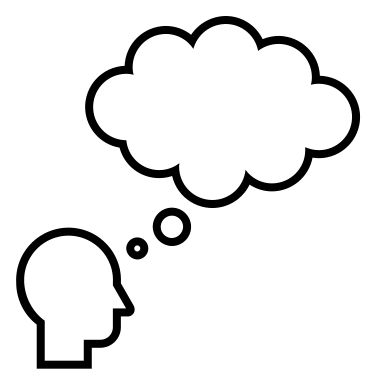
(sugar, candy, chips, crackers, white bread

and rice)

1. Minimal nuts, seeds, plant milk, tofu and tempeh \_\_\_ \_\_\_

**Transfer:**

While the learning and performance context are similar regarding reviewing recipes, identifying ingredients and modifying ingredients, transfer is addressed through the opportunity for learners to choose which recipes to isolate and modify during the module based on their food preferences. Another way that I will promote transfer is by using real recipe examples that learners can actually use to make a meal. Incorporating choice is critical for the instruction since learners will be choosing recipes based on food preferences in their performance context. This learner choice allows learners to personalize their learning and increases the relevance of learning. In addition, I plan to include reflection questions or prompts that ask learners to reflect on the objective related to their personal context at the end of each objective. For example:

**Time to Reflect**

Think about meals you enjoy eating. How could you modify them to follow the WFPB criteria?

I believe these reflection questions will help learners transfer their learning from the lesson to their real-world performance context.

**Conclusion:**

In the conclusion, I will restate the lesson objectives and instructional goal and provide a summary of key concepts. To conclude the lesson, I will include a congratulatory message and a congratulatory visual like confetti or a badge or award icon for successfully completing the lesson. I will specifically state that learners can now isolate WFPB recipes and modify non-WFPB recipes following the WFPB criteria. I will also discuss how the newly acquired skill connects to the larger picture of developing a meal plan and making a WFPB recipe that follows the WFPB lifestyle to increase application of the new skill. In the conclusion, I will also give them a resource page that includes URLs to WFPB resources and recipes. This will allow learners the opportunity to explore more recipes and apply their newly acquired skill.

References

Davison, C. (2022, January 19). *Beginner's Guide to a Plant-Based Diet*. Forks Over Knives. Retrieved March 6, 2022, from https://www.forksoverknives.com/how-tos/plant-based-primer-beginners-guide-starting-plant-based-diet/