MICROWAVE MAGIC!

Ann Hardman (BYU SFL 110) -- State FACS Conference, 2012

Background Information, Standards and Objectives

STANDARD FNI 1.0 Students will apply the skills of kitchen equipment and management.

OBJECTIVE FNI 1.2 Explain the basic principles of cooking in a microwave.

FUNCTION:

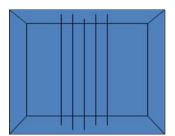
Objective 1.2.2: Identify how microwaves cook food

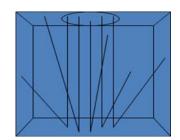
Microwave ovens can cook, defrost or reheat food in a fraction of the time it takes in conventional ovens, and also save up to 75% of the energy. The rapid cooking of small amounts of food is convenient, but not without some trade-offs. Example: The texture of vegetables that have been prepared in the microwave is often chewier than those that have been steamed or boiled. Some people consider that to be an undesirable characteristic. The excellent color and flavor, however, often provide sufficient compensation to them.

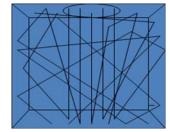
HOW IT WORKS:

Electromagnetic waves are emitted by a magnetron tube and set in motion by a fan or turn table. Some areas get more microwaves, resulting in uneven cooking—rotating helps cook evenly.

The microwaves come out of an opening in the metal case. They are reflected off the sides of the microwave oven, and penetrate the food in the process.







Objective 1.2.1 Identify that microwaves are attracted to fat, sugar, and water molecules

Microwaves are attracted to water, fat, and sugar molecules causing them to vibrate, create heat, and cook the food.

Function Activity:

Have students rub their hands together. The friction creates heat, and warms your hands as they are rubbed together. This is the same way microwaves generate the heat to cook food. High frequency waves of energy are produce by a magnetron tube. They penetrate the cookware and go to the center of the food. The food molecules begin to vibrate, and create friction. That friction creates heat, and cooks the food from the inside out.

COOKWARE:

Objective 1.2.3: Identify appropriate cooking containers

The cookware you choose for the microwave is very important. Because microwaves only interact with water within a molecule, correct cookware will not absorb heat. It only becomes hot as heat transfers to it from the food. You may test empty cookware by putting it in the microwave for one minute, then touching it to measure the temperature.

Good materials include:

Glass Ceramics New paper products

microwave safe plastic (NOT cool whip containers)

Never use:

recycled paper - It is re-processed with chemicals that are released when heated. general plastics – They frequently melt.

metal - Microwaves can't penetrate metal, so energy waves are reflected, causing sparks and arching. It could even reflect the wave back to the magnetron, causing it to explode. (like in a cartoon?) Small amounts of foil may be used if they are grounded on the bottom of the microwave. If foil touches the sides, sparks may occur.

Shape:

Choose round pans rather than square or rectangular pans. Round pans allow microwaves to hit the food evenly. Microwaves overlap in the corners of square or rectangular containers, causing the corners to overcook.

Ring shaped containers allow the microwaves to hit from the center as well as other angles, and cook the center of the food more quickly. A ring may be formed by putting a glass or custard cup in the center of a round container.

RECIPE CONVERSION:

There is no standard conversion from conventional to microwave cooking.

Remember when you are converting a recipe, use almost 1/4 less liquid because there is less evaporation.

Foods containing liquid, sugar and fat cook faster.

Flavors tend to remain stronger so you can substantially reduce the amount of salt.

Start a recipe conversion by reducing the cooking time by 3/4 of the suggested conventional cooking time. Check for doneness at regular intervals. Stop the process when cooking is complete, or gradually increase the time until you obtain the desired result. Make microwave conversion notes on your recipe.

COOKING:

Objective 1.2.4 Discuss basic principles of microwave cooking – cooking time, standing time and ways to increase even cooking, appropriate foods and limitations.

Time:

In a recipe, cooking time is the total time food is exposed to microwave energy. It is often divided into multiple intervals, with instructions calling for you to stir or add ingredients between cooking segments. Just a few seconds of overcooking will cause the product to dry out and become tough. Because food does not brown in the microwave, you must test for doneness.

Power:

The power in a microwave oven is measured in watts. The ovens vary in wattage from 600 to 1,100 watts. Because of this, some microwave ovens cook faster than others. (Most recipes are written for the 700-watt oven, which is the industry standard.)

Always start with the shortest time indicated in a recipe, and add time if necessary. Make adjustments and take notes as you prepare recipes for the first time in your microwave.

Standing Time:

Because food continues to cook after the microwaves have stopped, most recipes indicate a specific amount of "standing time". This time lasts until the molecules have stopped vibrating, and cooking is complete.

SAFETY: Objective 1.2.5: Discuss prevention of burns and exploding or splattering of food

Equipment Safety;

There is a seal around door that contains the microwaves. There is also a Door Safety Switch/Short Circuit Safety Switch which turns the power off when the door is opened. Do not attempt to use a microwave oven if the door does not seal properly, is bent, or hinges or latches are broken.

*Operating an empty microwave for more than a minute or two increases heat around the magnetron and can cause damage, even a fire.

Piercing:

It is necessary to pierce the skin or membrane of certain food, such as egg yolks, potatoes, liver, sausage casings, egg plant, and squash. Moisture is contained by them, and pressure builds as the moisture converts to steam. Piercing allows steam to escape, and prevents an explosion inside the microwave.

Covering Food:

Covering food should be a standard procedure in microwave cooking. Covering prevents spattering as food cooks, helps to distribute the heat, and retain moisture as foods cook. The steam held in can reduce cooking time, and tenderize foods as well.

Heat Cautions:

Cookware often becomes hot as food cooks. Use hot pads to remove containers from the oven. Steam builds when containers are covered during cooking. Remove any covering from the back of the cookware so the steam goes away from you.

MICROWAVE LESSON OUTLINE

Depending on your class schedule, this unit may take from 2 to 4 days.

- 1. Ask students to tell something they know about microwave ovens. List responses on a white board or overhead projector.
- 2. Have students rub their hands together and explain that this is the way microwaves create the heat to cook food. (See function activity, p.1)
- 3. Show and discuss the power point presentation, or give background information verbally.
- 4. Have students gather microwave information by completing the lab experiments.
 - A. "My Microwave Information and Safety Inspection" sheet.
 - B. "Which Cookware is for Me"
 - C. "Popcorn Cooking Patterns"
 - D. "Marshmallow Hot Spots"
- 5. Reinforce concepts / Reward students for completion of the information packet by having each student make a microwave S'more.

Microwave S'mores

Ingredients: 2 graham cracker squares, 1 marshmallow, 1/2 mini Hershey bar

Directions: 1. Put chocolate and marshmallow on one graham cracker square.

- 2. Microwave for 14 seconds.
- 3. Press second graham cracker square on top of the melted marshmallow. Enjoy!

- 6. Complete a lab plan for the microwave cooking lab.
- 7. In the microwave lab you may have all kitchens make the same recipe(s), or have each kitchen make a different recipe and share with the class buffet style.

Microwave Lab Demonstrations

A. Do a microwave information and safety inspection

Every microwave is different. Have students inspect the microwave they will be using, and fill out an inspection worksheet.

B. Conduct a safe cookware test.

Every cooking unit will be given a different container. They will determine if it is a good choice for microwave cookware by conducting a wet and dry experiment. They will share their findings with the other kitchens so everyone has complete results.

C. Demonstrate cooking patterns by popping popcorn. (Each group may pop a small bag.)

The first kernels that pop are still exposed to the microwaves, and will be black in the center by the time the last kernels pop. Let students sort, then examine, taste and evaluate the kernels.

Ask students to share microwave cooking experiences.

- 1. Pop a large bag of microwave popcorn for 4 minutes.
- 2. Have volunteers sort the bag into three dishes for observation during the lab:
 - a. white and fluffy = the final kernels to pop
 - b. white with a black center = the kernels popped mid-way through the cooking process
 - c. brown with black centers = the first kernels to pop

D. Demonstrate direction and penetration of waves with marshmallows.

- 1. Turn the glass plate over, or turn off the carousel so it does not rotate.
- 2. Place 5 marshmallows on a paper plate one center, four in a square around it.
- 3. Put plate in the microwave with marshmallows facing front, back, center, and sides.
- 4. Microwave on high for 1 minute. Have students observe and chart the wave pattern as they see which marshmallows expand first.

Ask: Why did the marshmallows expand at different rates?

Microwaves come from a set location, and initially go to a set place in the oven. Because the plate is stationary, you can see where those spots are.

How does this affect the microwave cooking process?

Those spots cook first, and can create hot spots. This causes uneven cooking.

What must we do to make sure food cooks evenly?

Foods must be stirred, or rotated $\underline{1/4 \text{ turn}}$ at intervals during the cooking process. (Turning $\underline{1/2 \text{ turn}}$ positions food so waves penetrate in almost the same place.)

Reinforcement / Reward: Let each student make a microwave S'more.

Recipe and instructions are in the recipe packet

	Microwave Information and Safety Inspection
1.	Who is the manufacturer of this appliance?
2.	How many watts does your microwave have?
3.	Draw and label the parts of your microwave.
4.	Check the door and seal. Do they appear to be safe?
5.	Both the outside and inside of a microwave should be cleaned with a sudsy cloth and rinsed with a clean damp cloth. Spatters on the inside of a microwave may be wiped with a paper towel. Never use a chemical oven cleaner, abrasive cleaners or sharp objects. Why do you think it is important to keep the microwave oven clean?
6.	What questions do you have about safely using your microwave?

Name _____ Class ____ Date ____ Score ____

Name Class Date Score

"Which Cookware is For Me"

- 1. Every cooking unit will be given a different container.
- 2. Place the empty container in the microwave. Turn it on "high" for one minute. Remove it from the oven. Mark on the chart if it is hot, warm, or cool.
- 3. Measure 1 cup of water into the container. Repeat the one minute test, and mark on the The chart if the container is hot, warm, or cool.
- 4. Share your findings with the other kitchens so everyone has complete results.

Group	Material	Test	Hot	Warm	Cool
1	Glass	dry			
	Glass	with water			
2	Ceramic	dry			
	Ceramic	with water			
3	Paper Plate	dry			
	Paper Plate	with water			
4	Wood	dry			
	Wood	with water			
5	Plastic	dry			
	Plastic	with water			
6	Cool Whip Container	dry			
	Cool Whip Container	with water			
7	Other	dry			
	Other	with water			

Which cookware do you think is the best for microwave cooking? Why?

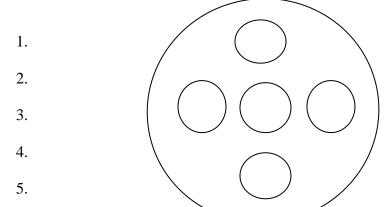
Name	Class	Date	Score	
		es A Microway corn Cooking Pat		
The first kernels that pop ar There will be texture and que pop.			ut the cooking process. first, in the middle, and at the time t	he last kernels
1. Pop a mini bag of micro seconds between pops – abo		nutes. (Usually yo	ı would stop the microwave when th	ere are 1 to 2
2. Sort the bag into three o	lishes as in #3. Observe	e and taste kernels t	rom each plate.	
3. Evaluate and compare t	he appearance, flavor, a	and texture of each	group:	
c. brown				
4. How can you use th	is information in micro			

Share an experience you have had with microwave cooking:

Name	Class	Date	Score
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Microwave (Marshmallow) Hot Spots

- 1. Turn the glass plate over, or turn off the carousel so it does not rotate.
- 2. Place 5 marshmallows on a paper plate one in the center, four in a square around it.
- 3. Put plate in the microwave with marshmallows facing front, back, center, and sides.
- 4. Microwave on high for 30 seconds. Observe and chart the microwave pattern as you see the way the marshmallows expand.
- 5. Draw arrows from the numbers to the "marshmallow", showing the order they expanded.



Why did the marshmallows expand at different rates? How does this affect the microwave cooking process? 2. What must be done to make sure food cooks evenly? 3.

1.

Traile Class Date Score	Name	Class	Date	Score
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Microwave Quiz

*Complete each sentence with the correct word from the answer list.

			ar	e emitted	by a magnetron	tube and penetrate	
	food by		off the	e	of the m	nicrowave.	
	Fat, sugar and v	water attra	act		and		
	Molecules		, cro	eate		, and cook food	
	from the				·		
	Correct cookwa	are will n	ot			·	
				_emits ch	emicals during th	ne cooking process.	
	Square pans are because the corners						
	Ring shaped co	ntainers a	allow microwa	ves to hit	from	·	
	Microwave power is measured in Seven hundred is standard.					undred is standard.	
	Standing time i	s added u	ntil the molect	ules		·	
	Foods with a ca	t be		to prevent	an explosion.		
ISWE	er List (No	words w	rill be used tw	vice, not	all words will l	oe used)	
	heat		inside out		recycled paper		
hing	5	left	1	reflecti	•	start vibrating	
t tor			many angles		right	stop vibrating vibrate	
ter	venly		megahertz microwaves		round pans sides	vibrate under cook	
	magnetic waves			slow	sides	watts	
t	magnetic waves		pierced			watts	
ι ne _			Class _	speed	Date	Score	

<u>Microwave Quiz Key</u> *Complete each sentence with the correct word from the answer list.

1.	Electromagnetic waves are emitted by a magnetron tube and penetrate						
	food by reflect	ing of	f the sides of the	ne micro	wave.		
2.	Fat, sugar and water attract microwaves and speed cooking.						
3.	Molecules <u>vibrate</u> , create <u>heat</u> , and cook food						
	from the inside	<u>: </u>	out				
4.	Correct cookwa	re will r	ot absorb	heat			
5.	Recycled pap	er	emits chemica	ls during	g the cooking pro	ocess.	
6.	Square pans are	worst	because the con	ners <u>ove</u>	er cool	<u>K</u> .	
7.	Ring shaped con	ntainers	allow microwav	es to hit	from <u>many</u>	angles	_•
8.	Microwave power is measured in watts. Seven hundred is standard.						
9.	Standing time is added until the molecules stop vibrating .						
10.	Foods with a casing must be pierced to prevent an explosion.						
Answer List (No words will be used twice, not all words will be used)							
absorb arching best center cook ev electror heat	5	left over co	many angles megahertz microwaves ok pierced	slow speed	recycled paper ng right round pans sides	square j start vib watts worst	

MICROWAVE MAGIC RECIPES

FACS State Conference – 2012

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QUICK CHICKEN CORDON BLEU

4 boneless skinless chicken breast halves (6 ounces *each*)

2 teaspoons Dijon mustard 1/4 cup grated Parmesan cheese

1/2 teaspoon paprika 1/4 teaspoon pepper

4 thin slices fully cooked ham 3 to 4 tablespoons mayonnaise

1 cup soft bread crumbs

SAUCE

1 tablespoon butter 1/4 teaspoon salt

1 tablespoon all-purpose flour 1/2 cup shredded Swiss cheese 1 cup milk 2 Tbsp. orange juice or sprite

- 1. Flatten the chicken to 1/2-in. thickness (plastic wrap). Spread mustard on one side; sprinkle with paprika. Top each with a ham slice. Roll up tightly; secure with toothpicks.
- 2. In a small bowl, combine the bread crumbs, Parmesan cheese and pepper. Brush chicken with mayonnaise; roll in crumb mixture.
- 3. Place in a shallow 2-qt. microwave-safe dish; cover loosely. Microwave on high for 7 minutes; turn chicken. Cook 5-1/2 minutes more or until meat is no longer pink. Keep warm.
- 4. In a 1-qt. microwave-safe dish, heat butter on high for 20 seconds; stir in flour until smooth. Cook, uncovered, on high for 20 seconds. Add milk and salt. Cook 2-3 minutes longer or until thickened. Stir in cheese until smooth. Add 2 T. orange juice or sprite.
- 5. Discard toothpicks from chicken; serve with sauce.

Microwave Barbeque Chicken Strips

2 chicken breasts 1/2 cup ketchup

1 green bell pepper, chopped1 tablespoon yellow mustard1 yellow onion, chopped1 tablespoon dark brown sugar

1 clove of garlic, peeled and minced 2 tablespoons water

- 1. Pound the chicken breasts (plastic wrap) until they're a quarter inch thick all the way across.
- 2. Cut chicken breasts into strips, and place in a microwave-safe baking dish.
- 3. Layer the chopped onion, green pepper and garlic on top of the chicken.
- 4. Mix the ketchup, mustard, water and brown sugar together in a separate mixing bowl, and pour over the top of the chicken. (You may replace this mixture with 3/4 cup of your favorite BBQ sauce).
- 5. Cover loosely with microwave-safe plastic wrap.
- 6. Microwave on high for 6 to 10 minutes, turning the chicken strips over after about 5 minutes.
- 7. Continue to microwave until chicken is cooked all the way through (test by cutting several strips in half, and seeing if the middle is cooked.)

Microwave Chicken Nuggets

1 ½ lbs. boneless, skinless chicken breasts or thighs 1/2 tsp/ Italian herb seasoning

1 C. cornflakes cereal 1/4 tsp. onion powder 1 tsp. paprika 1/4 tsp. garlic powder

1. Cut chicken into bite-sized cubes. Rinse

- 2. Place cornflakes in a plastic bag, Crush with a rolling pin. Add seasonings and shake.
- 3. Add chicken a few pieces at a time. Shake to coat.
- 4. Place on lightly greased microwave safe baking pan so they do not touch.
- 5. Cover with waxed paper. Cook on high for 6-9 minutes, or until tender, turning over every 2 minutes.

Honey Mustard Dipping Sauce

1/2 cup fat-free mayonnaise 1/4 cup prepared mustard 2 tablespoons sugar 2 tablespoons honey

1. Stir ingredients together until smooth. Serve with fried and baked chicken.

MICROWAVED SWEDISH MEATBALLS from COOKS.COM

1 lb. lean ground beef 2 tsp. parsley flakes

1 egg 1/2 tsp. salt 1/2 c. dry bread crumbs 1/8 tsp. allspice 1/2 c. milk, <u>divided</u> 1/8 tsp. pepper

1/4 c. finely chopped onion

1 (10 3/4 oz.) can condensed cream of mushroom soup

- 1. Combine ground beef, egg, bread crumbs, <u>1/4 cup milk</u>, onion, parsley, salt, allspice, and pepper.
- 2. Shape into 1 ¼ -inch meatballs (about 30) and arrange in oblong baking dish.
- 3. Cover lightly with wax paper. cook at medium power for 9-10 minutes. Stir once halfway through.
- 4. Blend soup with remaining 1/4 C. milk. Pour over meatballs; stir lightly to coat.
- 5. Heat covered with wax paper 4 minutes or until heated through.
- 6. Serve over buttered noodles, sprinkled with chopped parsley, if desired.

Microwave Potato Chips (4 servings)

1 Tbsp. vegetable oil 1/2 tsp. salt, or salt / seasoning to taste

1 potato, sliced paper thin with a vegetable peeler (peeling is optional)

- 1. Scrub potato and remove the eyes. Peel if desired.
- 2. Slice crosswise with a vegetable peeler into a container of cold water.
- 3. Swish to remove surface starch then pat dry.
- 4. Pour vegetable oil into a plastic bag. Add potato slices and shake to coat.
- 5. Lightly coat a large dinner plate with oil or non stick spray. Arrange potato slices in a single layer on the plate.
- 6. Microwave on high for 3 to 5 minutes, or until lightly browned. (If they are not browned, they will not become crisp.) Time will vary by the power of the microwave.
- 7. Remove chips from plate and toss with salt. Let cool. Repeat cooking instructions with remaining potato slices.

<u>Variation:</u> Use sweet potatoes. Toss with a mixture of 1/2 tsp. salt, 2+ tsp. brown sugar, and 1/2 tsp. cinnamon

<u>Cooking Variation:</u> You may bake at 400° for 20-25 minutes, turning once at 10 minutes

<u>Or</u> fry chips until lightly golden in 375° oil. (Put layers of paper towels over a cooling rack to drain chips.)

Microwave Baked Potato

1 large russet potato 3 Tbsp. shredded Cheddar cheese

1 Tbsp. butter or margarine 1 Tbsp. sour cream

Salt and pepper to taste

- 1. Scrub the potato, prick several times with a fork. Place on a plate.
- 2. Cook on full power in the microwave for 5 minutes. Turn it over and check for degree of doneness. Continue to cook for 5 more minutes, or until soft.
- 3. Remove from microwave. Cut in half lengthwise and mash the inside. Top with butter and 2 Tbsp. of cheese. Return to microwave for up to 1 minute to melt the cheese.
- 4. Remove from microwave. Top with sour cream and remaining cheese, and serve.

Fresh Corn On The Cob

2 ears fresh corn on the cob

Melted butter or margarine, if desired

- 1. To cook in waxed paper: Cut squares of waxed paper. Husk corn and remove silks. Wash corn. Roll each ear with water that clings to kernels in waxed paper. Brush with melted butter or margarine before rolling up in waxed paper, if desired. Twist ends of waxed paper to seal. Place spoke fashion in microwave oven. Microwave at full power (high) for 5 minutes or until kernels are tender, rearranging ears once.
- 2. To cook in the husks: Carefully pull husks down ear far enough to remove silks but still keep husks intact. Brush corn with melted butter or margarine, if desired. Pull husks back over corn. Quickly run husks under cold water to add moisture for cooking. Place spoke-fashion in microwave oven. Microwave at full power (High) for 5 minutes or until kernels are tender, rearranging ears once.

Microwave Caramel Corn

4 quarts popped corn 1/2 tsp. salt

1 C. brown sugar 1 tsp. vanilla extract 1/2 C. margarine 1/2 tsp. baking soda

1/4 C. light corn syrup

- 1. Pop corn, sort out un-popped kernels, and place in a large brown paper bag.
- 2. In a 2 qt. microwave safe dish, combine brown sugar, margarine, corn syrup, salt and vanilla.
- 3. Cover with plastic wrap and microwave on high for 3 minutes. Remove from MW and stir.
- 4. Cover and microwave for 1 ½ minutes. Remove from MW, add baking soda, and stir.
- 5. Pour syrup over the popcorn in the bag. Roll down the top to close. Shake, and place in MW.
- 6. Cook 1 minute and 10 seconds. Remove, shake, and turn over in microwave.
- 7. Cook another 1 minute and 10 seconds. Shake, then pour onto waxed paper to cool and allow coating to set.

 Store in an air tight container.

Microwave Caramels

1 C. butter or margarine, melted 1 (1 lb.) pkg. light brown sugar

1 (14 oz.) can sweetened condensed milk 1 tsp. vanilla extract

1 C. light corn syrup 2 C. semisweet chocolate chips, melted

- 1. Blend first 4 ingredients in large microwave-safe bowl. Microwave on High for 17 minutes, stirring every 3 minutes, mix in vanilla.
- 2. Pour into buttered 9x13" pan. Chill in refrigerator overnight.
- 3. Pour melted chocolate over caramels. Cut into 1-inch squares.

*May substitute almond bark for chocolate chips or increase amount of chocolate and dip caramel squares into chocolate to coat on all sides. Yield: 117 -- 1" pieces

Pineapple Dessert

20 oz. can crushed pineapple 1/4 C. melted butter 1/4 C. brown sugar 3/4 C. coconut

1 ½ C. miniature marshmallows 1/2 C. chopped pecans 1/2 box of Yellow cake mix dry (1 ½ C. + 1 T.) or 1box Jiffy Yellow cake mix

1. Coat an 8" microwave pan with non-stick spray.

2. Layer as written: stir pineapple and brown sugar together, then marshmallows, Cake mix, butter, coconut, and pecans

3. Lightly cover with plastic wrap, and microwave for 12 minutes at full power.

Can be served warm or cold. Serve plain or with ice cream or Cool Whip.

Peanut Butter Marshmallow Treats

3 Tbsp. margarine or butter

1/4 cup peanut butter

6 cups crisp rice cereal

1 bag (10 oz.) large marshmallows or 3 ½ cups mini marshmallows

24 mini peanut butter cups, or 1/2 cup candy coated peanut butter candies

- 1. Line a 9x13" baking pan with plastic wrap, and coat with non stick spray.
- 2. Place margarine, peanut butter and marshmallows in a large microwavable bowl.
- 3. Microwave uncovered on high for 1 minute. Stop and stir. Microwave for 30 more seconds. Stop and stir. If the mixture is not melted and smooth, continue at 30 second intervals.
- 4. Add cereal and stir until well coated. Press into the prepared pan (non-stick spray on your hands). Use a knife to make indentations showing serving sizes. Press one peanut butter cup, or several candy coated peanut butter candies into the center of each piece.
- 5. Cut into squares.

Microwave S'mores

Ingredients: 2 graham cracker squares, 1 marshmallow, 1/2 mini Hershey bar

Directions: 1. Put chocolate and marshmallow on one graham cracker square.

- 2. Microwave for 14 seconds.
- 3. Press second graham cracker square on top of the melted marshmallow. Enjoy!

Microwave Lollipops

1 C. sugar 1/2 C. light corn syrup desired flavoring and coloring

- 1. Insert sticks in molds, and place on greased marble slab or foil-lined cookie sheet.
- 2. Stir ingredients together in a clear 8 C. glass, microwave safe, mixing bowl.
- 3. Cover with plastic wrap. Microwave on high for 3 minutes.
- 4. Being careful of the hot steam, carefully remove plastic wrap and stir.
- 5. Cover with new plastic wrap and microwave 3 more minutes. Watch carefully and remove from the oven before the 3 minutes if the syrup becomes darker than a medium yellow color.
- 6. Remove plastic wrap. Stir in food coloring and flavoring. Do not measure in advance. (1/8 tsp. oils, 1/2 tsp. extracts)
- 7. Pour candy into molds. "Free form" any candy that is left over. (If necessary, roll each stick to coat the back with candy.)

DO NOT save time and double the recipe. Remember your readings about doubling candy recipes? It's not a good idea. Just make two separate batches.

Microwave Cake in a Mug

1/4 C. flour 3 Tbsp. water 9 Tbsp. hot chocolate mix 3 Tbsp. oil 1 Egg 1 pinch of salt

cooking spray 2 tsp. chocolate chips optional

- 1. Spray cooking spray into a large (2 C.) microwave safe mug.
- 2. Measure the flour and hot chocolate mix into the mug. Stir.
- 3. Crack the egg into the mug. Stir to slightly beat the egg.
- 4. Add water and oil and stir until thoroughly moistened. Be sure to scrape the bottom.
- 5. Optional: Drop 2 tsp. (milk) chocolate chips on top. (They will sink to the bottom.)
- 6. Microwave on high for 3 minutes. Use a potholder to remove it from the microwave.
- 7. Tip your cake cylinder out of the mug into a dish. (It will look a bit damp and wrinkled.)
- 8. Cut the cake into quarters to release steam and speed cooling.
- 9. Top with a glaze, chocolate syrup, whipped cream or ice cream if desired.

MICROWAVE MINI-CAKES

Use approximately 2 Tbsp. of each topping ingredient. Spray bowls with non-stick cooking spray. Wipe edges before cooking.

Microwave Carmel Turtle Cake

Mix together in a small (cereal size) bowl and stir for one minute:

1/2 cup yellow cake mix

1/3 cup water

Microwave approximately 90 seconds. Top warm cake with chopped nuts, chocolate chips and caramel topping. Microwave an additional 10-20 seconds

Microwave Snickers Bar Cake

Mix together in a small (cereal size) bowl and stir for one minute:

1/2 cup chocolate cake mix

1/3 cup water

Microwave approximately 90 seconds.

Chop up 1 small Snickers candy bar and sprinkle pieces on top of warm cake.

Drizzle with chocolate syrup, and microwave an additional 10-20 seconds.

Microwave Oreo Cookie Cake

Mix together in a small (cereal size) bowl and stir for one minute:

1/2 cup white cake mix

1 crushed Oreo cookie

1/3 cup water

Microwave approximately 95 seconds. Sprinkle another crushed Oreo cookie on top and garnish with whipped topping

Applesauce Spice Cake

Mix together in a cereal bowl and stir for one minute:

1/2 c. spice cake mix

1/3 c. water

Microwave about 90 seconds.

Smother with applesauce (4 oz snack size). Serve with whipped topping.

Rocky Road Cake

Mix together in a cereal bowl and stir for one minute:

1/2 c. chocolate cake mix

1/3 c. water

Microwave about 90 seconds.

Top warm cake with marshmallows, chocolate chips, and chopped nuts. Microwave an additional 10-20 seconds to soften chips.

Cherry Chip Cake

Mix together in a cereal bowl and stir for one minute:

- 1/2 c. cherry chip cake mix
- 1/3 c. water

Microwave about 90 seconds. Top warm cake with whipped topping and maraschino cherries.

Mint Chocolate Chip Cake

Mix together in a cereal bowl and stir for one minute:

- 1/2 c. chocolate cake mix
- 1/3 c. water

Microwave about 90 seconds. Top warm cake with mint chocolate chips. Serve with mint chocolate chip ice cream.

German Chocolate Cake:

Mix together in a cereal bowl and stir for one minute:

- 1/2 c. German chocolate cake mix
- 1/3 c. water

Microwave about 90 seconds.

Top warm cake with coconut, chopped nuts, and chocolate chips. Microwave an additional 10-20 seconds.

Criss Cross Raspberry Cake:

Mix together in a cereal bowl and stir for one minute:

- 1/2 c. yellow cake mix
- 1/3 c. water
- (Powdered sugar for dusting)

Microwave about 90 seconds. Dust top with powdered sugar.

Criss-cross top of cake with melted raspberry jam.

Microwave Brownies

<u>Ingredients</u>	Equipment				
1/2 C butter, softened	Mixing Bowl				
1 C sugar	Wooden Spoon				
2 eggs	Measuring cups and spoons				
1 t vanilla	8-inch round glass or microwave safe pan				
1/2 C cocoa	sifter				
1/2 C flour					
2 T powdered sugar, divided					
1 Grease round microwave oven-safe	e cake pan or pie plate, sprinkle lightly with extra				
granulated sugar					
2 With a wooden spoon, cream butte	r and sugar in a large mixing bowl.				
3 Add eggs and vanilla and stir to blo	end well.				
4 Add flour, cocoa and 1T powdered sugar. Mix for 2 min.					
5 Pour batter into round microwave oven-safe cake pan or pie plate.					
6 Microwave on high 5 to 7 min on HIGH power.					
7 Dust the remaining 1 T powdered s	sugar over the brownies using the sifter.				
8 Let stand for 5 min to complete the cooking process.					
9 Cut into wedges or squares and enjoy					

Cocoa-Cranberry Crisipy Bars

- 1 (10.5 oz.) pkg. marshmallows (45 large, 3 ½ C. small)
- 1 C. sweetened, dried cranberries or cherries
- 2 Tbsp. butter
- 1/2 C. semi-sweet mini chocolate chips
- 6 C. chocolate crisp rice cereal
- 1. Line a 9x13" baking pan with plastic wrap, and coat with non stick spray.
- 2. Combine cereal, dried cranberries and chocolate chips in a large bowl.
- 3. Place margarine and marshmallows in a large microwave safe bowl.
- 4. Microwave uncovered on high for 1 minute. Stop and stir.
- 5. Microwave for 30 more seconds. Stop and stir. If the mixture is not melted and smooth, continue at 30 second intervals.
- 6. Pour over cereal and stir until well coated. Press into the prepared pan (non-stick spray on your hands). Use a knife to make indentations showing serving sizes.
- 7. Press additional mini-chocolate chips on top if desired. Cool, cut and serve.

Mint Chocolate Truffles

1/3 C. semi-sweet-mint chocolate chips

1/4 C. unsweetened cocoa, sifted

1/2 C. (4 oz.) 1/3 less fat cream cheese

1/4 C. powdered sugar, sifted

1 (16 oz.) pkg. powdered sugar, sifted

1/4 C. mint chocolate chips

- 1. Place chocolate chips in a microwave safe bowl. Microwave for 30 seconds, then stir. Microwave at "10-seconds-then-stir" intervals until chips are melted and smooth.
- 2. Add cream cheese to melted chips. Beat with a mixer at medium speed until smooth.
- 3. Add powdered sugar, 1 cup at a time. Beat until well blended. Mixture will be thick and dry.
- 4. Press mixture into a 6 inch square on plastic wrap. Cover and chill for at least 1 hour.
- 5. Remove the top covering. Cut into 48 squares. Shape each square into a ball.
- 6. Roll half the balls in sifted cocoa. Roll half the balls in sifted powdered sugar.
- 7. Place the 1/4 C. chocolate chips in a heavy zip lock bag.—(Do not seal it.) Microwave for 30 seconds, then knead in the bag. Microwave at 10-seconds-then-stir intervals until chips are melted and smooth.
- 8. Snip a small hole in one corner of the bag, and drizzle a chocolate design across the top of the truffles.
- 9. You may refrigerate or freeze these truffles for 1 month. Be sure to let them stand and reach room temperature before serving.

Hershey Cream Truffles

2 (8 oz. each) Hershey milk chocolate bars.

1 (8 oz.) container of cool whip

Chopped nuts or coconut as desired.

- 1. Thaw cool whip in the refrigerator overnight. Take out of the refrigerator and let stand until it is almost room temperature.
- 2. Chop the Hershey bars. Place in a large, microwave safe bowl. Microwave for 30 seconds, then stir. Continue to microwave at 10-seconds-and-stir intervals until chocolate is melted and smooth. Let stand until it is almost room temperature.
- 3. Fold the cool whip into the chocolate. (The mixture will be stiff.)
- 4. Roll the truffle mixture into 2 large or 4 small logs. Roll them in chopped nuts or coconut as desired. Chill 1 hour to overnight.
- 5. Slice and serve. Refrigerate leftovers.