

# New Meal Pattern Training

Michigan Department of Education  
Office of School Support Services – School Nutrition Programs  
July 2012



# Overview

- Background
  - Law Requirements
  - Changes from Proposed Rule
- New Meal Pattern
- Implementation
  - Timeline
- General Provisions
- Meal Components
- Dietary Specifications
- Current Standards vs. Final Rule
- Offer vs. Serve
- Questions/Comments



# Background



# Law Requirements

- Sec. 9
  - National School Lunch Act
    - Meals must reflect the Dietary Guidelines
- Sec. 201
  - Healthy, Hunger-Free Kids Act of 2010
    - Regulations based on recommendations from the Institute of Medicine (IOM)



# Final Rule (January 2012)

- Title
  - Nutrition Standards in the National School Lunch and School Breakfast Programs (77 FR 4088)
- Published
  - January 26, 2012
- Effective date
  - July 1, 2012



# Significance of this Rule

- School meal programs impact millions of children every day
- Obesity and food insecurity/hunger are dual threats to many of these children
- Rule aligns with current nutrition science



# Major Changes from Proposed Rule

- Changes to breakfast phased-in gradually over 3 years
- No meat/meat alternate at breakfast
- Additional year for implementation of sodium target #2
- Students may take smaller portions of fruits and vegetables under Offer versus Serve
- Compliance based on 1-week review of menus



# New Meal Pattern



# Reading the Meal Pattern Chart

	Breakfast Meal Pattern			Lunch Meal Pattern		
	GradesK-5 <sup>a</sup>	Grades 6-8 <sup>a</sup>	Grades 9-12 <sup>a</sup>	GradesK-5	Grades6-8	Grades9-12
<b>Meal Pattern</b>	<b>Amount of Food<sup>b</sup> Per Week (Minimum Per Day)</b>					
<b>Fruits (cups)<sup>c,d</sup></b>	5 (1) <sup>e</sup>	5 (1) <sup>e</sup>	5 (1) <sup>e</sup>	2.5 (0.5)	2.5 (0.5)	5 (1)
<b>Vegetables (cups)<sup>c,d</sup></b>	0	0	0	3.75 (0.75)	3.75 (0.75)	5 (1)
<b>Dark green<sup>f</sup></b>	0	0	0	0.5	0.5	0.5
<b>Red/Orange<sup>f</sup></b>	0	0	0	0.75	0.75	1.25
<b>Beans/Peas (Legumes)<sup>f</sup></b>	0	0	0	0.5	0.5	0.5
<b>Starchy<sup>f</sup></b>	0	0	0	0.5	0.5	0.5
<b>Other<sup>f,g</sup></b>	0	0	0	0.5	0.5	0.75
<b>Additional Veg to Reach Total<sup>h</sup></b>	0	0	0	1	1	1.5
<b>Grains (oz eq)<sup>i</sup></b>	7-10 (1) <sup>j</sup>	8-10 (1) <sup>j</sup>	9-10 (1) <sup>j</sup>	8-9 (1)	8-10 (1)	10-12 (2)
<b>Meats/Meat Alternates (oz eq)</b>	0 <sup>k</sup>	0 <sup>k</sup>	0 <sup>k</sup>	8-10 (1)	9-10 (1)	10-12 (2)
<b>Fluid milk (cups)<sup>l</sup></b>	5 (1)	5 (1)	5 (1)	5 (1)	5 (1)	5 (1)
<b>Other Specifications: Daily Amount Based on the Average for a 5-Day Week</b>						
<b>Min-max calories (kcal)<sup>m,n,o</sup></b>	350-500	400-550	450-600	550-650	600-700	750-850
<b>Saturated fat (% of total calories)<sup>n,o</sup></b>	< 10	< 10	< 10	< 10	< 10	< 10
<b>Sodium (mg)<sup>n,p</sup></b>	≤ 430	≤ 470	≤ 500	≤ 640	≤ 710	≤ 740
<b>Trans fat<sup>n,o</sup></b>	Nutrition label or manufacturer specifications must indicate zero grams of <u>trans</u> fat per serving.					

# Implementation Timeline

NEW REQUIREMENTS	Implementation (School Year) for NSLP (L) and SBP (B)						
	2012/13	2013/14	2014/15	2015/16	2016/17	2017/18	2022/23
<b>FRUITS COMPONENT</b>							
Offer fruit daily	L						
Fruit quantity increase to 5 cups/week (minimum 1 cup/day)			B				
<b>VEGETABLES COMPONENT</b>							
Offer vegetables subgroups weekly	L						
<b>GRAINS COMPONENT</b>							
Half of grains must be whole grain-rich	L	B					
All grains must be whole-grain rich			L, B				
Offer weekly grains ranges	L	B					
<b>MEATS/MEAT ALTERNATES COMPONENT</b>							
Offer weekly meats/meat alternates ranges (daily min.)	L						
<b>MILK COMPONENT</b>							
Offer only fat-free (unflavored or flavored) and low-fat (unflavored) milk	L, B						
<b>DIETARY SPECIFICATIONS (to be met on average over a week)</b>							
Calorie ranges	L	B					
Saturated fat limit (no change)	L, B						
Sodium Targets <sup>1</sup> -Target 1Target 2Final target			L, B			L, B	L, B
Zero grams of trans fat per portion	L	B					
<b>MENU PLANNING</b>							
A single FBMP approach	L	B					
<b>AGE-GRADE GROUPS</b>							
Establish age/grade groups: K-5, 6-8, and 9-12	L	B					
<b>OFFER VS. SERVE</b>							
Reimbursable meals must contain a fruit or vegetable (1/2 cup minimum)	L		B				
<b>MONITORING</b>							
3-year adm. review cycle		L, B					
Conduct weighted nutrient analysis on 1 week of menus	L	B					



# Lunch Program Changes

- All changes to lunch go into effect July 1, 2012, *with the following exceptions:*
  - 3-year administrative review cycle (July 1, 2013)
  - All grains must be whole grain-rich (July 1, 2014)
  - First target (#1) for average weekly sodium limit (July 1, 2014)
    - Target 2 goes into effect for SY 2017-2018
    - Final Target goes into effect for SY 2022-2023



# Breakfast Program Changes SY 2012-13

- No changes to breakfast effective July 1, 2012
- Schools continue with current meal pattern/menu approaches
- *Exceptions:*
  - Milk requirement, which is already in effect (fat & flavor)
  - Formulated grain-fruit products not creditable



# Breakfast Program Changes SY 2013-14

- New meal pattern goes into effect



# General Provisions



# Menu Planning Approach Changes

- Food-Based Menu Planning approach for all age/grade groups
  - NSLP operators must use FBMP
    - Beginning SY 2012-2013
  - SBP operators must use FBMP
    - Beginning SY 2013-14



# Age/Grade Groups

- Same age/grade groups for NSLP and SBP
  - K-5
  - 6-8
  - 9-12
- In the SBP, the change takes effect in SY 2013-2014 to ease burden on program operators



# Offer vs. Serve

- A student has to select a fruit or vegetable component
- Must select at least a ½ cup serving



# Meal Identification

- Identify content of reimbursable meal near or at beginning of serving line(s)
  - School discretion on how to identify these foods
- Assures students do not unintentionally purchase a la carte items



# Overview of Requirements and Clarifications



# Lunch Requirements



# Lunch Meal Components

- Fruits
- Vegetables
- Grains
- Meat/Meat Alternate
- Milk



# Fruits (Lunch)

<b>Lunch Meal Pattern</b>			
	<b>Grades K-5</b>	<b>Grades 6-8</b>	<b>Grades 9-12</b>
<b>Meal Pattern</b>	<b>Amount of Food<sup>b</sup> Per Week (Minimum Per Day)</b>		
<b>Fruits (cups)</b>	<b>2.5 (0.5)</b>	<b>2.5 (0.5)</b>	<b>5 (1)</b>



# Forms of Allowable Fruits in School Meals

- Fresh
- Frozen without sugar
- Canned in water, light syrup or juice
- Dried
- Pasteurized, 100 % full-strength juice



# Fruits: Clarifications

- No added sugar allowed in frozen fruit
  - Exemption until July 1, 2013, for lunch
  - Sugar added in preparation allowed, but discouraged
- School Breakfast Program
  - Frozen fruit w/sugar allowed until 2014-15



# Fruits: Clarifications on Juice

- No more than half of fruit or vegetable offerings may be in the form of juice
  - Weekly limit; no daily limit
- Juice credits as volume served
- Frozen 100% fruit juice w/o sugar can credit
- 100% fruit and vegetable juice blends
  - Credit based on first ingredient



# Fruits: Clarifications

- Dried fruit processed with sugar is allowed
  - Schools should be aware of maximum calorie limits
  - Credits as twice volume served - i.e. 1/8 cup raisins credit as 1/4 cup
- Snack - type fruit products may not credit
  - **Allowed:** whole dried fruit, whole dried fruit pieces
  - **Not Allowed:** 100% fruit strips, fruit drops, fruit leather



# Fruits: Clarifications

- Can serve  $\frac{1}{2}$  cup of fruit pieces and  $\frac{1}{2}$  cup fruit juice to meet daily requirement
- Can offer a combination of fruits to meet fruit component
  - $\frac{1}{2}$  cup pineapple tidbits +  $\frac{1}{2}$  cup fresh fruit cup



# Vegetables (Lunch)

	Lunch Meal Pattern		
	Grades K-5	Grades 6-8	Grades 9-12
Meal Pattern	Amount of Food Per Week (Minimum Per Day)		
Vegetables (cups)	3.75 (0.75)	3.75 (0.75)	5 (1)
• Dark green	0.5	0.5	0.5
• Red/Orange	0.75	0.75	1.25
• Beans/Peas (Legumes)	0.5	0.5	0.5
• Starchy	0.5	0.5	0.5
• Other	0.5	0.5	0.75
Additional Veg to Reach Total	1	1	1.5

# Vegetables

- **Daily** lunch serving reflects variety over week
- Vegetable subgroup **weekly** requirements for
  - Dark Green (e.g., broccoli, collard greens)
  - Red/Orange (e.g., carrots, sweet potatoes)
  - Beans/Peas (Legumes) (e.g., kidney beans, lentils, chickpeas)
  - Starchy (e.g., corn, green peas, white potatoes)
  - Other (e.g., onions, green beans, cucumbers)
  - Additional vegetables to meet 5 cup weekly total

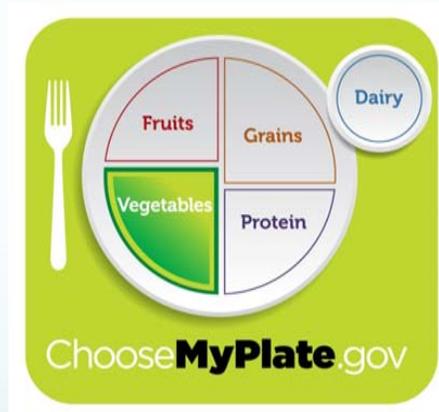


# Vegetables

- Variety of preparation methods available
  - Fresh, frozen, and canned products
  - USDA Foods offers a variety of no salt added or lower sodium products
- Changes in crediting of leafy greens
- Foods from the beans/peas (legumes) subgroup may be credited as a vegetable *OR* a meat alternate



# Vegetable Activity



# Dark Green and Red/Orange Vegetables

- Dark Green
  - bok choy
  - broccoli
  - collard greens
  - dark green leafy lettuce
  - kale
  - mesclun
  - mustard greens
  - romaine lettuce
  - spinach
  - turnip greens
  - watercress
- Red/Orange
  - acorn squash
  - butternut squash
  - carrots
  - hubbard squash
  - pumpkin
  - sweet potatoes
  - tomatoes
  - red bell peppers



***Subgroups are identified in the revised Fruits & Vegetables section of the FBG***



# Dry Beans and Peas

- black beans
- black-eyed peas
- garbanzo beans (chickpeas)
- kidney beans
- lentils
- lima beans (mature)
- navy beans
- pinto beans
- soy beans (mature)
- split peas
- white beans



# Dry Beans and Peas: Clarifications

- May only count a serving towards vegetable or meat/meat alternate requirement (but not both in the same meal)
  - Menu planner determines how they credit in advance (not at POS)
- “Dry” refers to mature beans
  - Canned and frozen mature beans acceptable
  - Fresh beans or peas do not qualify



# Starchy Vegetables

- Corn (white and yellow)
- Green peas
- Cowpeas, field peas, black-eyed peas (fresh, not dried)
- White potatoes
- Water chestnuts



# Vegetables: Clarifications

- Schools may offer small amounts of subgroups over the course of the week to meet weekly requirements
  - Minimum quantity is  $\frac{1}{4}$  cup
- No maximum limits on subgroups
  - Exception: Juice
- Categorizing unusual vegetables:

<http://www.cnpp.usda.gov/Publications/USDAFoodPatterns/ItemClustersandRepFoods.pdf>



# Vegetables: Clarifications

- Mixed Vegetable Dishes
  - Combinations containing  $\frac{1}{4}$  cup or more of each different veggie subgroups may credit toward appropriate subgroups
  - If quantities of each are unknown, the dish counts toward the “additional” requirement



# Vegetables: Clarifications

- Mixed salads
  - If mixed salad contains different vegetable subgroups (romaine/iceberg blend) and quantities are 1/4 cup or more, can credit to respective subgroup
  - If quantities of each are unknown, the total volume credits as “additional” requirement
  - \*Remember: 1/4 cup of uncooked leafy greens credit as 1/8 cup



How would a salad containing  
 $\frac{1}{4}$  cup of iceberg lettuce and  
 $\frac{1}{4}$  cup of romaine credit?



# Salad Bars - Clarifications

- May be located after the POS, as long as a system is in place to ensure each student selects a reimbursable meal
- Must ensure portions meet meal pattern requirements
- May use salad bar to meet weekly vegetable subgroup requirement
  - salad bar offerings must be listed on production records to count toward meal pattern requirements



# NFSMI Resources

- Qualifying beans/peas (legumes)
- Handout: Vegetable Subgroups
- Handout: Vegetables in subgroups



# Grains (Lunch)

<b>Lunch Meal Pattern</b>			
	<b>Grades K-5</b>	<b>Grades 6-8</b>	<b>Grades 9-12</b>
<b>Meal Pattern</b>	<b>Amount of Food Per Week (Minimum Per Day)</b>		
<b>Grains (oz eq)</b>	8-9 (1)	8-10 (1)	10-12 (2)



# Grains: Lunch

- Schools must offer daily and weekly serving ranges of grains at lunch
  - Maximums and minimums
- Initially, at least half of grains offered during week must be whole grain-rich
- Beginning in SY 2014-15, all grains offered must be whole grain-rich



# What is a Whole Grain?

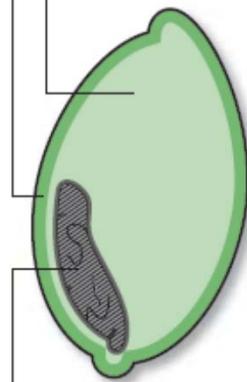
## Whole grain kernel

### Bran

"Outer shell" protects seed  
*Fiber, B vitamins, trace minerals*

### Endosperm

Provides energy  
*Carbohydrates, protein*



### Germ

Nourishment for the seed  
*Antioxidants, vitamin E, B vitamins*

- Consists of entire grain seed or kernel
  - Bran
  - Germ
  - Endosperm
- Many B vitamins, fiber, and antioxidants are removed when grains are refined



# Criteria for Whole Grain-Rich Foods

- Meet serving size requirements in Grains/Breads Instruction and
- Meet at least 1 of the following
  - Whole grains per serving must be  $\geq 8$  grams
  - Product includes FDA's whole grain health claim on its packaging
  - Product ingredient listing lists whole grain first (HUSSC criteria)



# Grains: Clarifications

- Each reimbursable meal must meet the daily grain minimum
- No *daily* grain maximum – only weekly maximum
- New crediting guidance
  - SP 30-2012: Grains Requirements for the NSLP and SBP



# Formulated Grain-Fruit Products

- Highly fortified grain products, specific nutrient profile as defined in Appendix A of 7 CFR 220
- Effective July 1, 2012, will no longer credit toward fruit component
- Can continue to credit as grains, but schools are discouraged due to high calorie, high sugar content
- Does not affect energy bars, granola bars, cereal bars



# Other Grain Component Issues

- Grain-Based Desserts
  - Only 2 oz eq grain-based desserts are allowed at lunch per school week
  - These items are major source of solid fats and added sugars, per DGA 2010
- Cost and Availability Concerns
  - Important to note that many whole grain options available in USDA Foods: brown rice, whole grain pasta, oatmeal, etc.



# Activity

## Food-Based Menu Grain Activity— Lunch Menu Options K-5

8-9 oz eq weekly

1 oz eq per day (minimum)

Monday	Tuesday	Wednesday	Thursday	Friday	Total
Pizza (crust) 2 oz eq					
WW Roll 1 oz eq					
WW Spaghetti 1 oz eq	Brown Rice 1 oz eq		Grain-based dessert		



# Meats/Meat Alternates (Lunch)

Lunch Meal Pattern			
	Grades K-5	Grades 6-8	Grades 9-12
Meal Pattern	Amount of Food Per Week (Minimum Per Day)		
<b>Meats/Meat Alternates (oz eq)</b>	8-10 (1)	9-10 (1)	10-12 (2)



# Meats/Meat Alternates

- Daily and weekly requirements for lunch only
  - 2 oz eq daily for students in grades 9-12
  - 1 oz eq daily for younger students
- Variety of meat/meat alternates encouraged
- Tofu and soy yogurt will be allowable as meat alternate
  - USDA memo SP 16 - 2012



# Meats/Meat Alternates: Clarifications

- Minimum creditable amount of M/MA is 0.25 ounce equivalent
- Tofu
  - May credit in NSLP & SBP only (not CACFP, nor SFSP)
  - 2.2 ounces of commercially prepared tofu containing at least 5 g of protein credits as 1 oz eq M/MA
  - When crediting processed tofu products, need to obtain documentation from manufacturer, to determine if the tofu in the product meets requirements outlined in SP 16-2012



# Milk (Breakfast and Lunch)

Lunch Meal Pattern			
	Grades K-5	Grades 6-8	Grades 9-12
Meal Pattern	Amount of Food Per Week (Minimum Per Day)		
<b>Fluid milk (cups) <sup>1</sup></b>	5 (1)	5 (1)	5 (1)



# Fluid Milk

- Allowable milk options include
  - Fat-free (unflavored or flavored)
  - Low-fat (unflavored only)
  - Fat-free or low-fat (lactose-reduced or lactose-free)
- Must offer at least 2 choices
- Does not alter nutrition standards for milk substitutes (e.g., soy beverages)
- Students *may* decline milk component under OVS
- Milk provisions also apply to children ages 3-4



# Milk: Clarification

- Rule does not change fluid milk substitution rule 7 CFR 210.10(d)(3)
- Special Milk Program
  - Milk fat restriction applies
  - Limit on flavored milk recommended, but not required
  - Variety requirement does not apply



# Breakfast Requirements



# Breakfast Meal Components

- Fruits
- Grains
- Milk



# Fruits (Breakfast)

Breakfast Meal Pattern			
	Grades K-5	Grades 6-8	Grades 9-12
Meal Pattern	Amount of Food Per Week (Minimum Per Day)		
<b>Fruits (cups)</b>	<b>5 (1)</b>	<b>5 (1)</b>	<b>5 (1)</b>



# Fruit (Breakfast)

- Fruit is a single component
- Vegetables may be offered in place of fruits
  - First 2 cups must be from non-starchy vegetables
  - For example, in order to serve hash browns, the weekly menu must include 2 cups of non-starchy vegetables



# Fruit (Breakfast)

- School Breakfast Program
  - Frozen fruit w/sugar allowed until 2014-15



# Grains (Breakfast)

	Breakfast Meal Pattern		
	Grades K-5	Grades 6-8	Grades 9-12
Meal Pattern	Amount of Food Per Week (Minimum Per Day)		
Grains (oz eq)	7-10 (1)	8-10 (1)	9-10 (1)



# Grains (Breakfast)

- Offer the daily and weekly serving ranges of grains at breakfast
  - Phased-in implementation of whole grain-rich beginning 2013-14
- Schools *may* substitute meat/meat alternate for grains once daily grains minimum is met
  - Must first offer 1 oz eq grains **daily**, then can offer M/MA



# Four Dietary Specifications (Lunch and Breakfast)



# Four Dietary Specifications

- Weekly average requirements
  - Calories
  - Sodium
  - Saturated fat
- Daily requirement
  - Trans fat



# Calorie Ranges

- Minimum and maximum calorie (kcal) levels
  - Average over course of the week
- Effective SY 2013-14 for SBP
- Effective SY 2012-13 for NSLP

## Grade Level:

K-5 (ages 5-10)

## Calorie Ranges:

Breakfast: 350-500

Lunch: 550-650



## Grade Level:

6-8 (Ages 11-13)

## Calorie Ranges:

Breakfast: 400-500

Lunch: 600-700



## Grade Level:

9-12 (Ages 14-18)

## Calorie Ranges:

Breakfast: 450-600

Lunch: 750-850



# Calorie Ranges: Clarifications

- Calorie maximums may not be waived for RCCIs or any other schools.



# Sodium

## Sodium Limits and Timeline

### Target 1: SY 2014-15

#### Lunch

≤1230mg (K-5)  
 ≤1360mg (6-8)  
 ≤1420mg (9-12)

#### Breakfast

≤540mg (K-5)  
 ≤600mg (6-8)  
 ≤640mg (9-12)

### Target 2: SY 2017-18

#### Lunch

≤935mg (K-5)  
 ≤1035mg (6-8)  
 ≤1080mg (9-12)

#### Breakfast

≤485mg (K-5)  
 ≤535mg (6-8)  
 ≤570mg (9-12)

### Final target: SY 2022-23

#### Lunch

≤640mg (K-5)  
 ≤710mg (6-8)  
 ≤740mg (9-12)

#### Breakfast

≤430mg (K-5)  
 ≤470mg (6-8)  
 ≤500mg (9-12)



# Sodium

- Naturally occurring sodium (i.e. milk) and nutrient analysis

Look for these words:

LOW-SODIUM  
sodium-free    no salt added  
sodium-reduced  
UNSALTED



Nutrition Facts	
Serving Size 1 cup (240g)	
Amount Per Serving	
Calories 41	Calories from Fat 0
% Daily Value*	
Total Fat 0 g	0%
Saturated Fat 0 g	0%
Trans Fat 0 g	
Cholesterol 0 mg	0%
Sodium 24 mg	1%
Total Carbohydrate 10 g	3%
Dietary Fiber 2 g	10%
Sugars 6 g	



ADAM.



# Sodium Reduction Efforts

- Procurement specifications and recipes will be modified
- Technical assistance and training resources will be available
- USDA Foods reducing sodium in foods available to schools
  - Already reduced for products such as most cheeses



# USDA Foods

- A list of available foods is on the USDA website:

<http://www.fns.usda.gov/fdd/schfacts/default.htm>



# Saturated Fat

- Limit saturated fat
  - Less than 10 percent of total calories
  - Same as current regulatory standard
- No total fat standard



# Trans Fat

- Nutrition label or manufacturer's specifications must specify zero grams of trans fat per serving (less than 0.5 gram per serving)
  - Begins SY 2013-2014 for SBP
  - Begins SY 2012-2013 for NSLP
- Naturally-occurring trans fat excluded
  - e.g. beef, lamb, dairy products
- Mixed dishes
  - e.g. beef and bean burritos



# Trans Fat: Clarification

- SFAs must rely on nutrition facts labels and manufacturer specifications to assess the amount of trans fat in menus
  - Must use Nutrition Facts Panel or spec sheets to determine if there are 0 g of trans fat per serving
  - Nutrient analysis software may not have complete trans fat data



# Nutrient Analysis

- Calculation is a weighted average of what is offered on each serving line
- Planned vs Offered Meals



# Menu Planning



# Age/Grade Groups

**Grade Level:**  
K-5 (ages 5-10)

**Calorie Ranges**  
Breakfast: 350-500  
Lunch: 550-650



**Overlaps**  
B: 400-500  
L: 600-650

**Grade Level:**  
6-8 (Ages 11-13)

**Calorie Ranges:**  
Breakfast: 400-500  
Lunch: 600-700



**Overlaps**  
B: 450-500  
L: ---

**Grade Level:**  
9-12 (Ages 14-18)

**Calorie Ranges:**  
Breakfast: 450-600  
Lunch: 750-850



# Age/Grade Groups

- Overlap in K-5 and 6-8 meal patterns
  - A single menu can meet both patterns
  - Must meet following:
    - 8-9 oz eq grains/week
    - 9-10 oz eq meats/meat alternates/week
    - Average daily calorie range 600-650



# Menu Planning for Grades 6-8 and 9-12

- Modest adaptations to menus to accommodate needs of older children:
  - Offer  $\frac{1}{2}$  cup more fruit daily
  - Offer  $\frac{1}{4}$  cup more vegetables daily
    - Need  $\frac{1}{2}$  cup more red/orange,  $\frac{1}{4}$  cup other,  $\frac{1}{2}$  cup additional (any subgroup) some time during the week
  - These changes alone *may* meet calorie needs for the 9-12 group
    - Consider an additional oz eq of grain and/or M/MA for the older kids



# Age/Grade Groups: Clarifications

- The term “age/grade groups” refers to grade groups only. School should plan menus based on the grade levels of students
- Pre-K meal pattern is not changing and schools must serve meals that meet *current* meal pattern to these students
  - Schools may serve a single menu to Pre-K and grades K-5, if both meal pattern requirements are met.



# Short and Long Weeks: Clarifications

- For Occasional Short Weeks
  - Menus do not have to be adjusted
  - Must be consistent with intent of meal pattern



# Multiple Offerings: Daily Minimum

- All offerings must meet the daily minimum requirement
  - For example, when offering pizza and a sandwich for Grades 9-12 on a daily basis, both the pizza and sandwich should contain 2 oz eq grains
  - Average of the Grain or M/MA ounce equivalents offered cannot meet the daily minimum requirement



# Multiple Offerings: Weekly Ranges

- Weekly range for Grains and M/MA:
  - Sum of all daily *minimum* offerings meets at least the weekly *minimum* requirement
  - Sum of all daily *maximum* offerings is equal to or less than the weekly *maximum* limit.



# Multiple Offerings: Clarifications

- Each independent line must meet the daily and weekly requirements (including subgroups)
  - If different stations available for selecting components, then all the stations as a whole must meet the daily and weekly requirements.
- The nutrient analysis should be weighted based on what is offered on each serving line



# Offer versus Serve (OVS)



# Offer versus Serve - Lunch

- Students must be offered all five required components: Meat/Meat Alternate, Fruit, Vegetable, Grains, and Fluid Milk.
- Students are allowed to decline two of the five required food components.



# OVS: Clarifications

- Lunch: Must take at least 3 of 5 components
- Breakfast: Must take 3 components of 4 offered items
- Number of components that may be declined at lunch the same for all age/grade groups
  - SFAs can no longer choose for elementary and middle schools



# OVS - What Must be Taken

- Must take at least  $\frac{1}{2}$  cup serving of the fruit or vegetable component
- Can take  $\frac{1}{2}$  cup of fruit or vegetable, but must take full components of other selected components



# OVS: Clarifications

- Students are allowed to take smaller portions of the Fruit and Vegetable components only. If a student selects less than the offered portion of Meat/Meat Alternate or Grains, it does not count as one of the minimum three required components at lunch.
- All meals must be set at a single price no matter how many components are declined.



# Examples: Meeting the $\frac{1}{2}$ Cup Fruit or Vegetable Requirement

- Student can select smaller portions of same vegetable or fruit
  - $\frac{1}{4}$  cup applesauce +  $\frac{1}{4}$  apple slices =  $\frac{1}{2}$  cup fruit
- Student can select  $\frac{1}{4}$  cup fruit and  $\frac{1}{4}$  cup of vegetables
  - $\frac{1}{4}$  cup strawberries +  $\frac{1}{4}$  cup dry beans and peas =  $\frac{1}{2}$  cup fruit *or* vegetable
- Student can select a dish containing a  $\frac{1}{2}$  cup *mixture* of fruits and vegetables
  - $\frac{1}{2}$  cup carrot raisin salad =  $\frac{1}{2}$  cup fruit or vegetable

# OVS Activity

- Handout: Offer versus Serve Reimbursable Meal



# What Counts as a Full Component?

- Minimum daily servings must be offered
- Depends on how menu planner designates a full component
  - For example, if menu planner offers pasta with a breadstick as an entrée, the full component would include both the pasta and the breadstick



# Meal Identification

- All menu items on serving line must be identifiable, labeled, or listed, at the beginning of serving line and prior to POS
- MDE may authorize alternatives to Point of Service lunch counts
  - Must be labeled well
  - Must be a system in place to ensure all meals are reimbursable



# Special Diets

- Meals for children with medical disabilities are not affected by new nutrition standards
- Optional accommodations must be consistent with new nutrition standards
- New standards do not impact fluid milk substitution rule



# Special Circumstances

- Field trips
- Older students in lower grades
- Other circumstances?



# Grains



# *Grain Requirements for the NSLP and SBP*

## *SP 30-2012*

- Addresses the new implementation of “ounce equivalencies” (oz eq) in the school meal programs and defines “whole grain-rich”
- Quantities of grains are based on ounce equivalencies in a manner that is consistent with the DGAs and MyPlate food guidance system
- Beginning **July 1, 2013**, all grains must be credited using “oz eq” method
- To facilitate transition, SFAs should continue to use current grains crediting method through SY 2012-2013
  - Section 3 Grains/Breads of the Food Buying Guide
  - FCS Instruction 783-REV.2



# Ounce Equivalent Standards

- Baked goods = must have 16 g creditable grain
  - Breads
  - Biscuits
  - Bagels
- Cereal grains = 1 oz or 28 g of dry product, or cooked volume of  $\frac{1}{2}$  cup
  - Oats
  - Pasta
  - Brown rice
- RTE cereals = 28 g or 1 oz of product
  - 1 cup of flakes or rounds
  - 1  $\frac{1}{4}$  cups puffed cereal
  - $\frac{1}{4}$  cup granola



# Counting Grains

- All grains are counted towards min/max requirements
- To facilitate implementation, battered and/or breaded products will not count towards weekly maximum in SY 2012-13
  - Must count these products toward weekly maximum beginning SY 2013-14
- $\frac{1}{4}$  of an oz eq is the smallest amount that can credit towards the quantities of grains
- Multiple items may be combined to meet daily minimum



# Counting Grains

- Bran and germ are not creditable
- If the product contains enriched ingredients or the product itself is enriched, it must meet the FDA standards for enrichment



# Updated Exhibit A

- Exhibit A contains the equivalent minimum weights for a wide variety of purchased food items to meet the oz eq criteria
- Program operators may use Exhibit A instead of calculating the actual amount of grains in a product since it provides the equivalent minimum weights to provide one oz eq of grains
- Exhibit A provides ounce equivalent information for a range of products commonly offered in schools



# Whole Grain-Rich Requirements for Lunch

- Beginning July 1, 2012 through June 30, 2014, half of the grains offered during the school week must meet the whole grain-rich criteria
- Beginning July 1, 2014, all grains must meet the whole grain-rich criteria



# Whole Grain-Rich Requirements for Breakfast

- Beginning July 1, 2013 through June 30, 2014, (SY 2013- 2014) half of the grains offered during the school week must meet the whole grain-rich criteria
- Beginning July 1, 2014, all grains must meet the whole grain-rich criteria



# Whole Grain-Rich Criteria

In accordance with NSLP and SBP regulations whole grain-rich products are:

- Foods that contain 100% whole grain

OR

- Foods that contain a blend of whole grain meal and/or flour and enriched meal and/or flour

*Note: Whole grain-rich products must contain at least 50% whole grains and the remaining grain content must be enriched.*



# Whole Grain-Rich Checklist

- **Meets Element 1 criteria:** The food item must meet the oz eq requirements as defined in Exhibit A

**AND**

- **Meets one of Element 2 criteria:**
  1. Groups A-G must contain 8 or more grams of whole grains per oz equiv. For Groups H and I, volumes/weights must be offered
  2. Contains FDA health claim:

*“Diets rich in whole grain foods and other plant foods and low in total fat, sat fat, and cholesterol reduce the risk of heart disease and some cancers.”*
  3. Whole grain is first ingredient



# Identifying Whole Grains

- Common and usual names for other whole grains are:
  - The word *whole* listed before a grain, for example, *whole*
  - The word *berries* and *groats* are also used to designate whole grains, for example, wheat berries or oat groats
- Rolled oats and oatmeal (including old-fashioned, quick-cooking, and instant oatmeal)



# Activity

- Handout: Whole Grain-Rich Foods
  - Whole Grain-Rich Foods
  - Grain Products (ingredients) that are not whole grains
  - Identifying Whole Grains



# Evaluating Mixed vs Non-mixed Dishes

- Non-mixed dishes (breads, cereals)
  - Whole grain ingredient must be primary ingredient by weight
  - Water excepted
  - Multiple whole grains could be added up to exceed the first ingredient by weight
- Mixed dishes (pizzas, corn dogs)
  - Whole grain must be primary grain ingredient
  - Example: Pizza crust, corn dog breading



# Evaluating Flour Blends

- When flour blends are listed in the ingredient list and grouped together, schools must know if the product contains at least 50 % whole grains. For example:

Flour blend (ww flour, enriched flour)



# Evaluating RTE Cereals

- Must list whole grain ingredient as primary ingredient and must be fortified
- Crediting: 1 oz eq =
  - 1 cup or 1 ounce flakes and rounds
  - 1.25 cups or 1 ounce puffed cereal
  - $\frac{1}{4}$  cup or 1 ounce granola



# Incorporating Grains into School Menus

- Encourage grain variety
- Grain-based desserts limited to 2 oz eq/week
  - These items are a major source of solid fats and added sugars per the 2010 DGAs
- Offer grains low in added sugar, sodium and saturated fat



# Some Examples of Whole Grain Ingredients

- Whole wheat
- Cracked wheat, crushed wheat
- Graham flour
- Whole oats/oatmeal
- Whole corn
- Brown rice & wild rice
- Whole rye
- Whole grain barley
- Buckwheat groats/whole buckwheat flour
- Quinoa
- Wheat or rye berries



# Products/Ingredients that Are Not Whole Grains

- Flour, white flour, wheat flour, all-purpose flour, unbleached flour, self-rising flour
- Durum flour, semolina
- Grits, corn grits, hominy grits
- Degerminated corn meal
- Enriched flour, rice flour
- Farina
- Couscous



# Adding Whole Grains to School Meals

- Whole grain-rich pretzels
- Whole grain-rich pita pockets
- Whole grain-rich cornbread
- Whole grain-rich crackers or cookies
- Whole grain-rich tortillas or taco shells
- Whole grain-rich pasta
- Whole grain-rich ready-to-eat or cooked breakfast cereals
- Whole grain-rich granola or granola bars
- Whole grain-rich pancakes or waffles
- Whole grain-rich bagels, breads, rolls, buns, or muffins



# Grain Label-Reading Activity



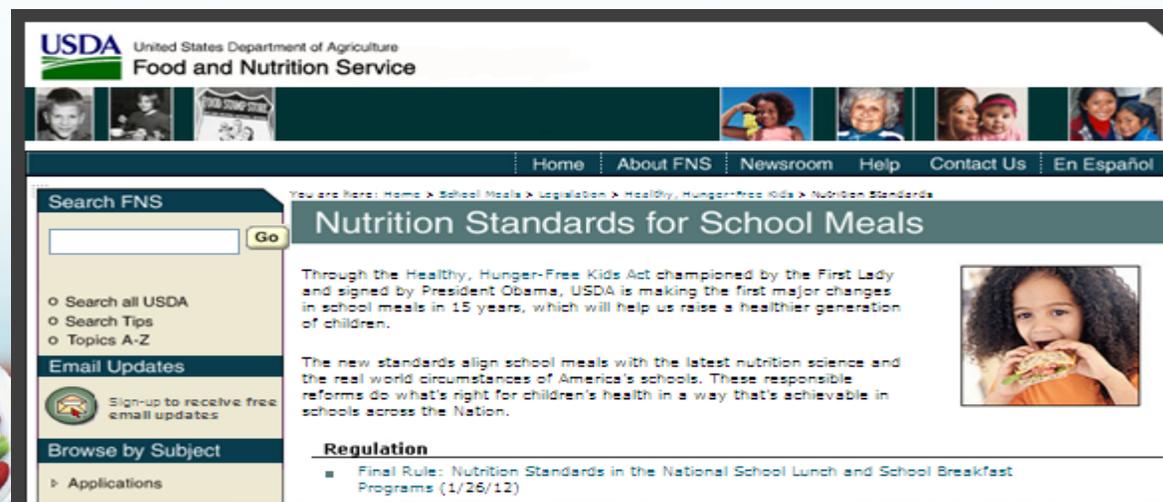
# Resources



# USDA Website

- For current updated information, go to the Nutrition Standards for School Meals webpage

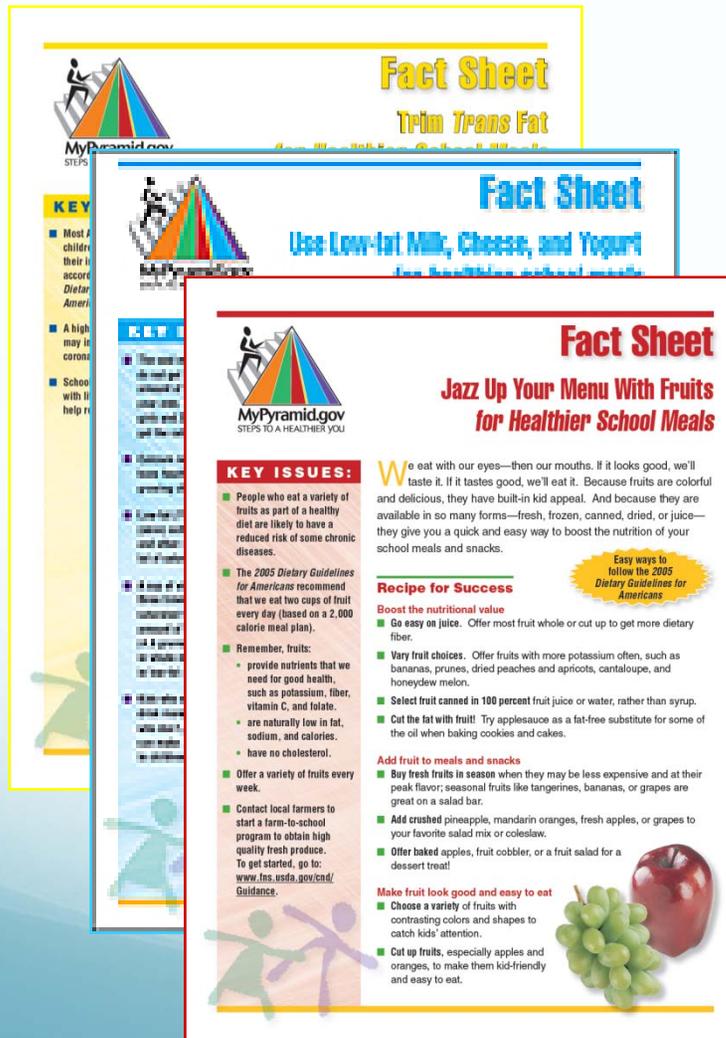
<http://www.fns.usda.gov/cnd/Governance/Legislation/nutritionstandards.htm>



The screenshot shows the USDA Food and Nutrition Service website. The header includes the USDA logo and the text "United States Department of Agriculture Food and Nutrition Service". Below the header is a navigation menu with links for Home, About FNS, Newsroom, Help, Contact Us, and En Español. The main content area is titled "Nutrition Standards for School Meals" and features a search bar, a "Go" button, and a "Search FNS" section with options for "Search all USDA", "Search Tips", and "Topics A-Z". There is also an "Email Updates" section with a sign-up button and a "Browse by Subject" section with a link for "Applications". The main text discusses the Healthy, Hunger-Free Kids Act and the new nutrition standards for school meals. A small image of a child eating a sandwich is visible on the right side of the page.

# Fact Sheets for Healthier School Meals

## *Revisions coming soon!*



- Low-fat and fat-free milk, cheese, and yogurt
- Fruits and Vegetables
- *Trans* Fat, Cholesterol, saturated Fats
- Whole Grains
- Sodium
- Dry Beans and Peas
- Fiber-Rich Foods
- Meeting Challenge of Rising Food Costs



# Updating the Food Buying Guide

## Food Buying Guide

for Child Nutrition Programs



U.S. Department of Agriculture  
Food and Nutrition Service

[www.fns.usda.gov/tn/Resources/foodbuyingguide.html](http://www.fns.usda.gov/tn/Resources/foodbuyingguide.html)

# Food Buying Guide Calculator

*fbg.nfsmi.org*

The screenshot shows the homepage of the Food Buying Guide Calculator. At the top, the title "Food Buying Guide" is displayed in large, bold, yellow letters, with the subtitle "Calculator for Child Nutrition Programs" below it. To the right of the title are two logos: "TEAM NUTRITION" and "NFMSMI National Food Service Management Institute The University of Mississippi". Below the title and logos, there is a search bar with a "Go" button and a dropdown menu for "Select A Food Group". A blue arrow points to the search bar. Below the search bar, there are five food groups, each with a representative image and a label: "Meat/Meat Alternates" (purple bar), "Vegetables" (green bar), "Fruits" (red bar), "Grains/Breads" (orange bar), and "Milk" (light blue bar). A purple arrow points to the "Meat/Meat Alternates" category. Below the food groups, there is a "Self-Tutorial" link.

**Food Buying Guide**  
Calculator for Child Nutrition Programs

Choose a **Food group** by clicking on an image below, or enter a keyword or food item in the **Search** field to the right, then click **Go**. Avoid the use of punctuation.

**Meat/Meat Alternates**

**Vegetables**

**Fruits**

**Grains/Breads**

**Milk**

Search  
Go

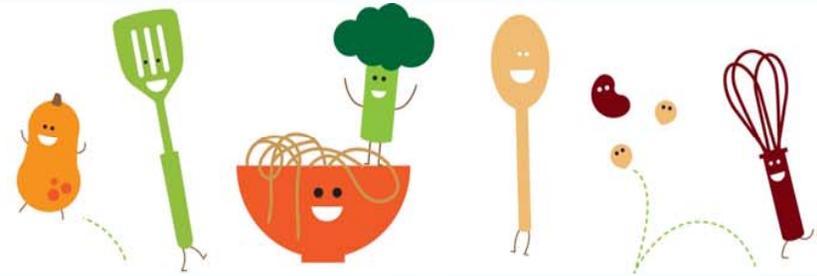
View Food Buying Guide

Select Food Group

-- Select A Food Group --

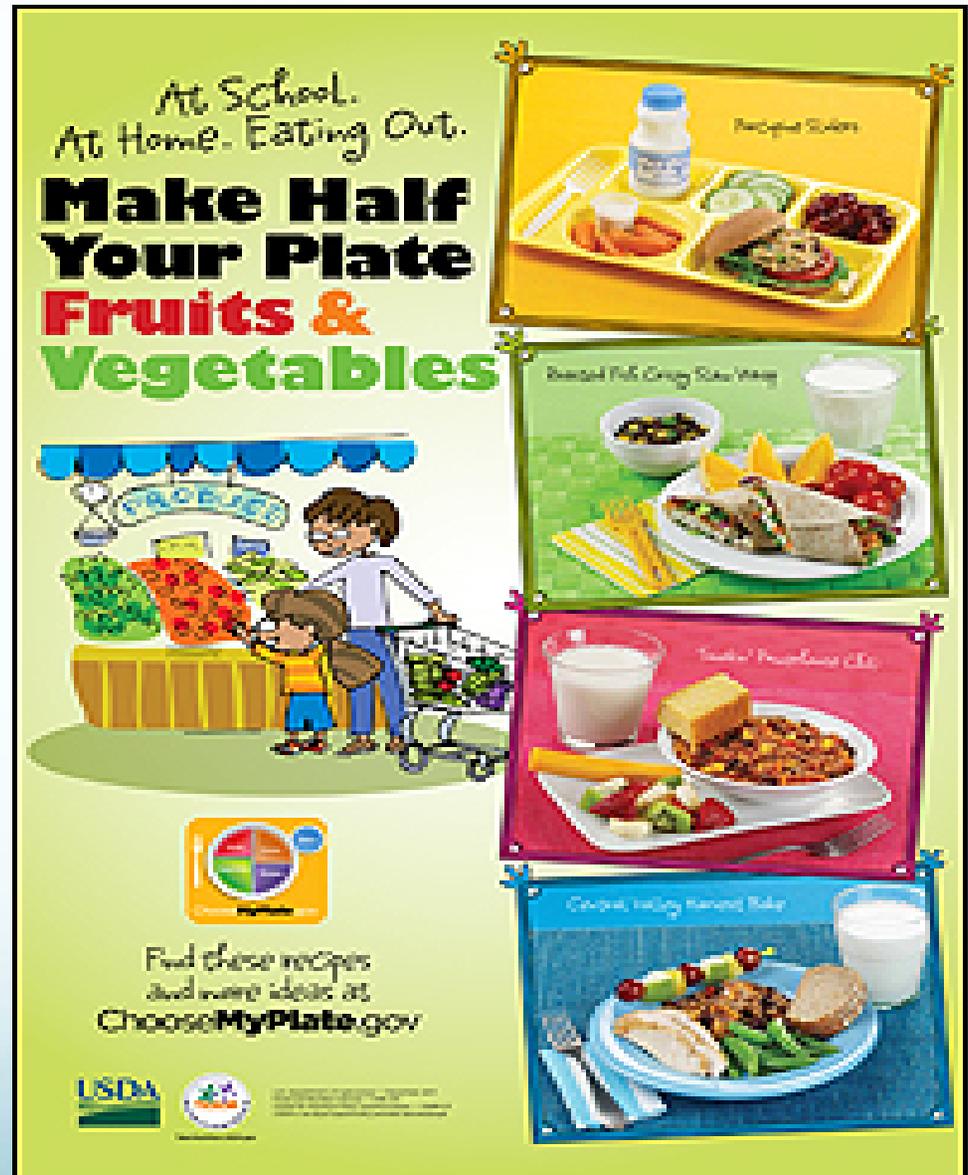
Self-Tutorial

# RECIPES FOR HEALTHY KIDS



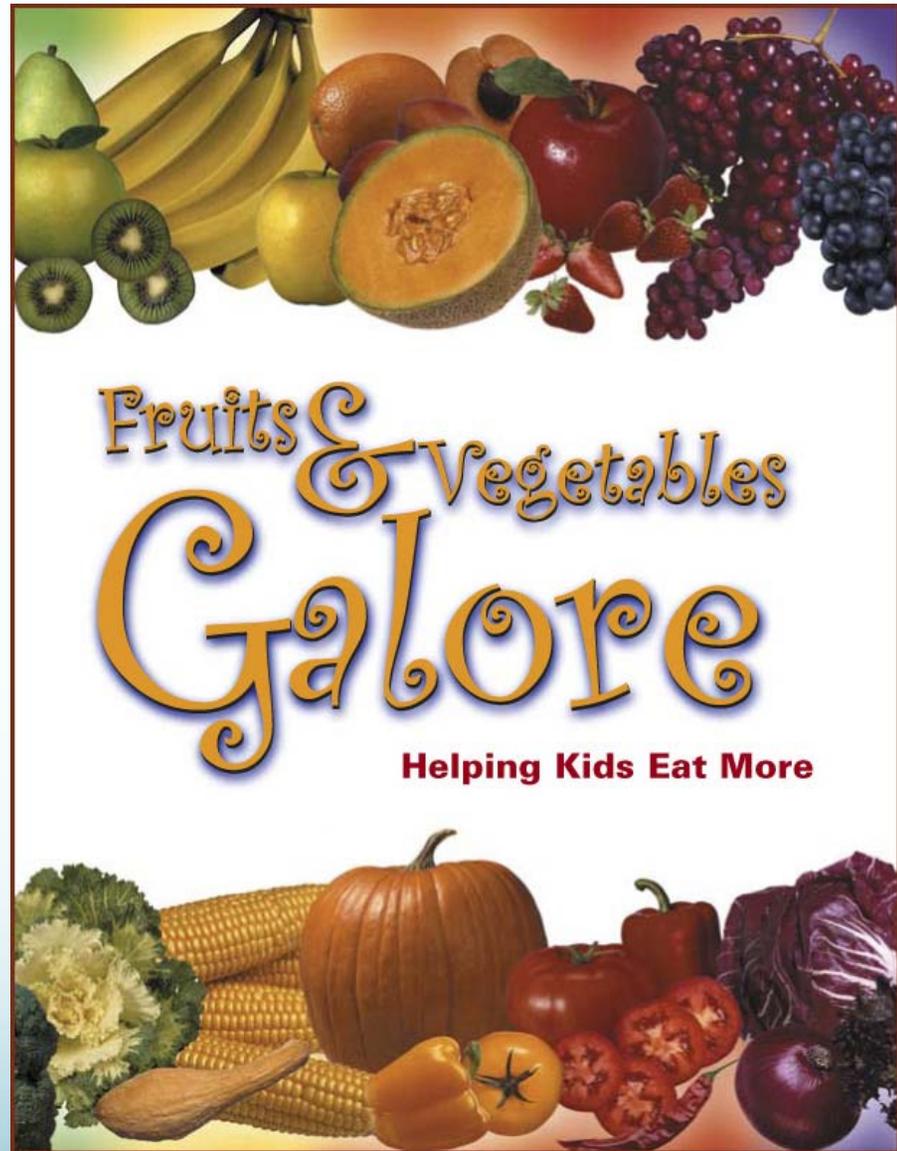
Available Now  
from  
Team Nutrition

# Make Half your Plate Fruits & Vegetables Poster



Available Now  
from Team  
Nutrition

Fruits and  
Vegetables  
Galore:  
Helping  
Kids Eat  
More



# Choose My Plate Resources

<http://www.choosemyplate.gov/food-groups/>

The screenshot displays the Choose My Plate website interface. At the top, the USDA logo and 'ChooseMyPlate.gov' are visible, along with navigation links for 'About USDA', 'FAQs', 'Newsroom', and 'Contact Us'. Below this is the 'United States Department of Agriculture' header and a search bar. A secondary navigation bar includes 'MyPlate', 'Weight Management & Calories', 'Physical Activity', 'SuperTracker & Other Tools', 'Printable Materials & Ordering', and 'Healthy Eating Tips'. The main content area is titled 'Vegetables' and features a large image of various vegetables. A sidebar on the left lists 'Topics' such as 'Food Groups Overview', 'Fruits', 'Vegetables', 'Grains', 'Protein Foods', 'Dairy', and 'Oils'. The 'Vegetables' topic is expanded, showing sub-topics like 'What's in the Vegetable Group?', 'How Much Is Needed?', 'What Counts as a Cup?', 'Health Benefits and Nutrients', 'Tips to Help You Eat Vegetables', and 'Beans and Peas Are Unique Foods'. The main content area contains the heading 'What Foods Are in the Vegetable Group?' followed by text explaining that any vegetable or 100% vegetable juice counts as a member of the group. It also mentions that vegetables are organized into 5 subgroups. A 'Key Consumer Message' box states 'Make half your plate fruits and vegetables.' and a green button at the bottom says 'View Vegetables Food Gallery'.

USDA ChooseMyPlate.gov  
United States Department of Agriculture

Home > MyPlate > Vegetables > What's in the Vegetable Group?

Topics

- > Food Groups Overview
- > Fruits
- > Vegetables
  - What's in the Vegetable Group?
  - How Much Is Needed?
  - What Counts as a Cup?
  - Health Benefits and Nutrients
  - Tips to Help You Eat Vegetables
  - Beans and Peas Are Unique Foods
- > Grains
- > Protein Foods
- > Dairy
- > Oils

## Vegetables

### What Foods Are in the Vegetable Group?

Any vegetable or 100% vegetable juice counts as a member of the Vegetable Group. Vegetables may be raw or cooked; fresh, frozen, canned, or dried/dehydrated, and may be whole, cut-up, or mashed.

Vegetables are organized into 5 subgroups, based on their nutrient content.

**Key Consumer Message** *Make half your plate fruits and vegetables.*

[View Vegetables Food Gallery](#)

# Available from the National Food Service Management Institute (NFSMI)

***Whole  
Grains in  
Child  
Nutrition  
Programs***





# Healthy Meals Resource System

<http://healthymeals.nal.usda.gov>

**Menu Planning** (<http://healthymeals.nal.usda.gov/menu-planning>)

Use these tools to plan menus with ease! Includes special sections on beans, fruits, vegetables, whole grains, and sodium reduction.

**Recipes** (<http://healthymeals.nal.usda.gov/recipes>)

Find quantity recipes for school food service from a variety of sources, including the searchable Recipe Finder database!

---

# Healthy Meals Resource System at NAL



United States Department of Agriculture

Healthy Meals Resource System









Home
About HMRS
News
Topics A-Z
Get Connected
Chefs Move to Schools
Help
Contact Us

**Search HMRS**



- Search all USDA
- Advanced Search
- Search Tips

**Education and Training Materials Database**

[Back to Search Results](#) | [New Search](#) | [SHARE](#)

**Basic Information**

## Menu Planning Tools

**Developer:** South Dakota Department of Education and Cultural Affairs  
**Publication Date:** 2003  
**Copyright Status:** Not Copyrighted  
**Availability:** Available in full text online 



*Image courtesy of South Dakota Department of Education and Cultural Affairs*

**Abstract:** Menu Planning Tools is a 10-hour training session composed of 5 sections for use by participants in an instructor-led training session. These materials were developed as part of a Team Nutrition grant awarded to the South Dakota Department of Education & Cultural Affairs, Child & Adult Nutrition Services.

**Detailed Information**

**Target Audience:** Nutrition Education: All Ages  
**Format:** Kits

**Review**

**Special Interest:** Material geared toward special needs and interests of intended target group  
**Scope:** Scope of information appropriate for target audience and essential topics discussed in appropriate detail  
**Ideas Summarized:** All major ideas summarized or reviewed to re-inforce key concepts; summaries easily identified

**Print Review**

**Overall Review:** Menu Planning Tools discusses the criteria for implementing offer versus serve and gives guidance on crediting grains/bread and developing standardized recipes among other topics. Suggestions for recipe analysis are also included.

**Borrowing Information**

**Borrowing Information**

# Best Practices Sharing Center at HMRS

<http://healthymeals.nal.usda.gov/best-practices>

The screenshot shows the website for the Best Practices Sharing Center at HMRS. At the top left is the USDA logo and the text "United States Department of Agriculture". To the right is the "Healthy Meals Resource System" logo with the "TEAM NUTRITION" graphic. A navigation bar contains links for Home, About HMRS, News, Topics A-Z, Get Connected, Chefs Move to Schools, Help, and Contact Us. The main content area is divided into three sections: a search box, a list of subjects, and a submission form.

**Search HMRS**

- Search all USDA
- Advanced Search

**Browse by Subject**

- Recipes
- Menu Planning
- Best Practices
- Resource Library
- HealthierUS School Challenge Resources
- Farm to School
- Local Wellness Policy Resources
- State Sharing Center
- Professional & Career Resources

**Best Practices Sharing Center**

Welcome to the Best Practices Sharing Center! This collection is intended for School Food Authorities and State Agencies to share resources and tools they use to serve healthy menus that meet school meal regulations.

Select from the options below to search for resources.

**Topics**

- Sodium reduction
- Fruits
- Vegetables
- Whole grains
- Meal pattern
- Fluid milk
- Meat / Meat alternatives
- Dietary specifications (calories, sat. fat, trans fat)
- Planning tools
- Monitoring tools

Hold the CTRL key to select multiple options.

**Formats**

- Menu
- Recipe
- Checklist
- Training material (video, webinar, etc.)

**Submit a best practice**

Materials may be submitted via email to [hmrs@ars.usda.gov](mailto:hmrs@ars.usda.gov). In the body of the email, please provide the developer name as well as the subject areas, audiences, and format that the resource covers.

# Best Practices Sharing Center at HMRS

Users can search by:

## TOPIC:

Sodium reduction

Fruits

Vegetables

Meal pattern

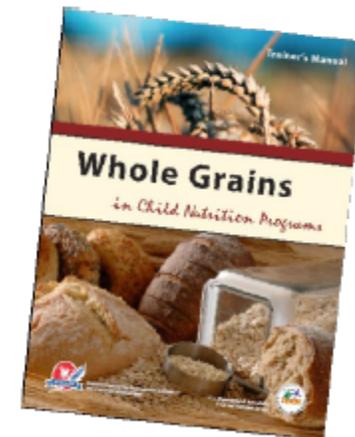
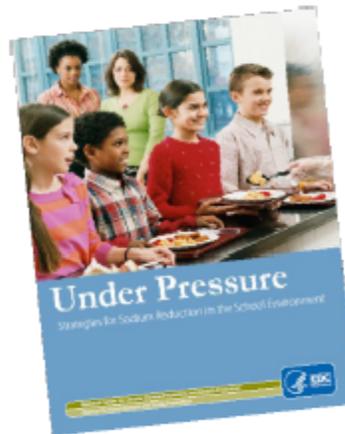
Fluid milk

Meat / Meat alternates

Dietary specifications (calories, sat. fat, *trans* fat)

Planning tools

Monitoring tools



# Best Practices Sharing Center at HMRS

Users can search by:

**FORMAT:**

Menu

Recipe

Checklist

Training material

Success story / Method of implementation

Healthy Hunger-Free Kids Act  
Meal Pattern Calculator

	Breakfast	Lunch	After-school	Dinner	Snacks	Drinks	Weekly Total
Requirements							
Total	100%	100%	100%	100%	100%	100%	100%
Breakfast (100% requirement)	100%	0%	0%	0%	0%	0%	100%
Lunch (100% requirement)	0%	100%	0%	0%	0%	0%	100%
After-school (100% requirement)	0%	0%	100%	0%	0%	0%	100%
Dinner (100% requirement)	0%	0%	0%	100%	0%	0%	100%
Snacks (100% requirement)	0%	0%	0%	0%	100%	0%	100%
Drinks (100% requirement)	0%	0%	0%	0%	0%	100%	100%
Total	100%	100%	100%	100%	100%	100%	100%
Breakfast (100% requirement)	100%	0%	0%	0%	0%	0%	100%
Lunch (100% requirement)	0%	100%	0%	0%	0%	0%	100%
After-school (100% requirement)	0%	0%	100%	0%	0%	0%	100%
Dinner (100% requirement)	0%	0%	0%	100%	0%	0%	100%
Snacks (100% requirement)	0%	0%	0%	0%	100%	0%	100%
Drinks (100% requirement)	0%	0%	0%	0%	0%	100%	100%
Total	100%	100%	100%	100%	100%	100%	100%
Breakfast (100% requirement)	100%	0%	0%	0%	0%	0%	100%
Lunch (100% requirement)	0%	100%	0%	0%	0%	0%	100%
After-school (100% requirement)	0%	0%	100%	0%	0%	0%	100%
Dinner (100% requirement)	0%	0%	0%	100%	0%	0%	100%
Snacks (100% requirement)	0%	0%	0%	0%	100%	0%	100%
Drinks (100% requirement)	0%	0%	0%	0%	0%	100%	100%
Total	100%	100%	100%	100%	100%	100%	100%

THE HUNGER-FREE KIDS ACT REGULATORY IMPLEMENTATION GUIDE



# Best Practices Sharing Center at HMRS

## Share your resources!

Materials may be submitted via email to  
[hmrs@ars.usda.gov](mailto:hmrs@ars.usda.gov).

In the body of the email, please provide the developer name as well as the subject areas, audiences, and format that the resource covers.



# Questions?

Please contact the School Nutrition Programs Office at  
517-373-3347

Or

Email your questions to:

[mde-schoolnutrition@michigan.gov](mailto:mde-schoolnutrition@michigan.gov)



