

WIC

FOOD PACKAGE

MODULE



Colorado Department of Public Health
& Environment
Nutrition Services/WIC Program
4300 Cherry Creek Drive South
Denver, Colorado 80246-1530

Table of Contents

<u>Sections</u>	<u>Pages</u>
Learning Objectives	I
I. Introduction	1-3
II. Infant Food Packages	4-23
III. Child Food Packages	24-41
IV. Women's Food Packages	42-47
V. Special and Metabolic Food Packages	48-55
VI. Food Package Tailoring	56-70
VII. Documentation of Food Package Tailoring	71-76
VIII. Encouraging the Use of WIC Foods	77-80
IX. Summary of Colorado WIC Food Packages	81-82
Post Test	1A-6A

Learning Objectives

After completing the module, the learner will be able to:



1. Identify:
 - a. the reasons why breastfeeding is considered to be the best way to feed young infants;
 - b. which WIC formulas require a physician's prescription for issuance;
 - c. the reasons why iron-fortified infant formula is the best alternative to breast milk;
 - d. the correct procedure for issuing low-iron and special formulas;
 - e. the reasons why powdered formula is recommended for breastfed infants;
 - f. the circumstances under which ready-to-feed formula may be issued;
 - g. the reasons why iron-fortified infant cereal is a good first solid food for babies;
 - h. the reasons why issuance of cereal on the WIC Program is delayed until the infant is at least 4 months of age;
 - i. the food package numbering system;
 - j. the criteria for authorized WIC juices and cereals;
 - k. why there is a 3-pound monthly limit for cheese;
 - l. the major food group to which each WIC food belongs;
 - m. the major nutrients supplied by each WIC food;
 - n. the supporting nutrition principles behind each aspect of the allowable WIC foods for children and women;
 - o. the WIC cereals highest in iron and which cereal contains no wheat;
 - p. appropriate tailoring measures when given a case study and the ability to correctly document these;
 - q. advantages to food package tailoring and participant characteristics that should be considered when assigning food packages;
 - r. specific examples of how WIC foods can be incorporated into providing nutrition education;
 - s. appropriate suggestions for a participant with lactose intolerance.
2. Recognize:
 - a. that the WIC Program encourages all pregnant women to breastfeed except when health reasons would prevent it;
 - b. that the WIC Program does not necessarily provide the full amount of formula needed by infants each month;
 - c. that the "Special food packages" are for women or children who need formula;
 - d. that most beans or legumes are higher in iron than peanut butter.

I. Introduction

Pregnant, breastfeeding, and postpartum women and infants and young children have particularly high nutrient needs and are vulnerable to nutrition problems. This is especially true if they are from low income families whose diets are typically inadequate in certain nutrients. This is why these individuals are targeted to receive WIC benefits.

Two of the important benefits provided by the WIC Program are the supplemental WIC foods and nutrition education. These benefits are aimed at preventing nutrition problems or correcting those that may be present. The particular types and amounts of WIC foods were chosen:



1. to help meet the specific nutrient needs of each type of WIC participant, and
2. to encourage and teach, through example, the principles of good nutrition.

An extremely important function that you, as a WIC staff member, perform is assigning food packages and issuing WIC food instruments or checks. It is important to understand the reasons why the food packages are designed as they are. This module presents detailed information on the nutrition principles underlying the WIC foods. Also presented is information on food package tailoring and how to best select the food package to meet the special needs and preferences of individual participants.

After completing the module, you should have a thorough knowledge of the WIC foods and of their appropriateness and importance to WIC participants. Good luck!



Introduction to the WIC Food Packages

Each staff person should have a copy of the Colorado WIC Program Food Packages Booklet that describes each of the food packages. Locate this booklet and refer to it as you complete this module. Keep in mind that you may need to refer to Standard Packages as well as Tailored and Special Packages on a regular basis. You are not expected to memorize all of the food package codes.

The WIC Food Package is a food prescription intended to supplement the participant's diet for a period of 30 days. Therefore, the WIC Food Instruments, or "checks" are available for the period of about a month. These checks are driven by the participant's base date; that is, the day that a person begins accruing their next set of checks. The base date is determined by the date a participant is certified on the Program.

The base date also allows for proration of food packages. Proration means that a participant's food package is decreased to meet the participant's needs for a shorter period of time. For example, proration occurs when a participant fails to pick up their checks within ten days of their base date. A prorated food package will automatically be produced. The food in the prorated food package is to supplement the participant's diet in the days remaining in their 30 day period.

The following is a brief description of the food package codes. Each full food package contains five digits: the first two are letters and the last three are numbers. The letters describe the category of the participant and generally what is in the food package. The numbers refer to the specific food package contents. The only exception to these descriptions is that when a food package has been prorated, the second digit will be a number.

For a summary of the foods contained in the WIC Food Packages refer to Section IX.

Understanding the Codes

When the last three digits of the food package refer to an infant formula, they will remain constant throughout the age of the infant. For example, IN100 contains 8 16-oz cans of powdered Enfamil with iron, JN100 contains 8 16-oz cans of powdered Enfamil with iron plus 2 boxes of infant cereal, KN100 contains the same type and amount of formula and cereal as JN100 with the addition of 2 32-oz containers of juice, and LN100 is just like KN100 only it contains 3 boxes of infant cereal.

Use the Food Package Booklet

Food package TX100 contains a standard food package for a 1-2 year old and CX100 is a standard package for a 2-5 year old. Refer to the Colorado WIC Food Package Booklet to learn what foods are contained in TX100 and CX100.

Use the Food Package Booklet

Refer to the Colorado WIC Food Package Booklet to learn the difference between food package BX100 and PX100.

Infant Food Packages

For infants, the first letter of the food package is related to the age of the infant. For example,

Infants aged 0-3 months: **I**

Infants aged 4-6 months: **J** (if 2 boxes of cereal), **H** (if 1 box of cereal)

Infants aged 7-12 months: **K** (if 2 boxes of cereal), **G** (if 1 box of cereal), **L** (if 3 boxes of cereal)

If the package contains no formula (i.e., infant is breastfed), the second letter is a **0**, or **T**.

If the package contains a **normal** standard formula the second letter is an **N**.

If the package contains a **special** formula the second letter is an **S**.

Refer to the section of Standard Infant Food Packages in your Food Package Booklet.

Child Food Packages

For children, the first letter of the food package is related to the age of the child. For example,

Children aged 1-2 (up to 24 months old): **T** (toddlers)

Children aged 2 years to 5 years old: **C** (children)

If the package is a **standard** food package the second letter is an **X**.

If the package is a **tailored** food package the second letter is an **T**.

If the package is a **lowfat** food package the second letter is an **L**.

If the package is a **homeless** food package the second letter is an **H**.

Refer to the section of Standard Food Packages in your Food Package Booklet.

Women's Food Packages

For women, the first letter of the food package is related to the category of the woman. For example:

Pregnant or partially breastfeeding women: **P**

Exclusively breastfeeding women: **B**

Postpartum **non**-breastfeeding women: **N**

If the package is a **standard** food package the second letter is an **X**.

If the package is a **tailored** food package the second letter is an **T**.

If the package is a **lowfat** food package the second letter is an **L**.

If the package is a **homeless** food package the second letter is an **H**.

Therefore BL100 is a lowfat food package for an exclusively breastfeeding woman and PX100 is a standard food package for a pregnant or partially breastfeeding woman. Refer to the section of Standard Food Packages in your Food Package Booklet

II. Infant Food Packages

The allowable foods for infants on the Colorado WIC Program and the standard monthly issuance amounts are summarized in the chart below:



	Iron-Fortified Formula	Infant Cereal	Infant Juice
Infant 0-3 months	31 13-oz. cans concentrate or 8 1-lb cans powdered (or equiv.) or 25 32-oz. cans ready-to-feed (or equiv.)		
Infant 4-5 months	31 13-oz. cans concentrate or 8 1-lb cans powdered (or equiv.) or 25 32-oz. cans ready-to-feed (or equiv.)	1-2 8-oz. boxes (single grain, no fruit added)	
Infant 6-12 months	31 13-oz. cans concentrate or 8 1-lb cans powdered (or equiv.) or 25 32-oz. cans ready-to-feed (or equiv.)	1-3 8-oz. boxes (single grain, no fruit added)	2 32-oz containers

- All Infants ▶ Breastfeeding is encouraged for all infants on the WIC Program; iron-fortified formula is provided as the best alternative for women who choose not to or who are unable to breastfeed.
- Exclusively Breastfed Infants ▶ Exclusively breastfed infants should require no supplemental formula and receive a food package of cereal and juice at the appropriate ages. An exclusively breastfed infant must be enrolled on the WIC Program at the initial visit and issued Food Package I0001, "Thank you for Breastfeeding." This counts the baby as a vouchered participant. The check is non-negotiable (can't be used to purchase anything); WIC staff may choose whether or not to give it to the endorser.
- Partially Breastfed Infants ▶ The foods for each age group are the same as as those listed on the previous page except that:
Powdered infant formula should be issued to

partially breastfed infants.

Breastfed infants less than one month old should ideally only receive 1 one-pound can of powdered formula per month.

Breastfed infants less than 4 months of age may receive up to 4 one-pound cans of powdered formula per month.

Breastfed infants older than 4 months of age may receive the maximum amount of formula.

WIC staff should help moms who supplement a breastfeeding infant with formula to understand that it is unlikely they will be able to maintain their milk supply as formula supplementation increases.

BREASTFEEDING

Why is breastfeeding encouraged for all WIC infants and mothers?

One of the important responsibilities of the WIC staff is to encourage pregnant women to breastfeed their babies, unless there are health reasons that would prevent it. In fact, the WIC Program feels so strongly about breastfeeding that promoting and supporting breastfeeding is part of WIC's Federal Regulations. Breast milk is the best, or ideal, food for young infants because:

- ♡ Breast milk is nutritionally superior to any alternative milk supply for the infant. It has just the right amount of protein, fat, carbohydrate, vitamins, and minerals. It is a complete food for the first 4-6 months of life and no other liquids or solids are needed. Breast milk is easy for the infant to digest.
- ♡ Breast milk requires no buying, mixing, or preparation. It is not subject to incorrect mixing. It is clean and not easily contaminated.
- ♡ Immunizing factors for protection from certain diseases are passed from mother to infant through breast milk.
- ♡ Breastfeeding encourages close physical contact between mother and infant. It may help in developing an affectionate, trusting relationship between mother and child.



For these reasons, breastfeeding is considered the best way to feed a young infant and that is why the WIC Program encourages breastfeeding whenever possible. You can learn more about breastfeeding in the Level II Breastfeeding Module.

INFANT FORMULA

What if a WIC mother is unable to or chooses not to breastfeed?

If a mother on the WIC Program is unable to or chooses not to breastfeed, the best alternative is to feed iron-fortified commercial infant formula. The two main types of commercial infant formula are cow's milk-based and soy-based.

Cow's milk formulas are most often given to infants and are considered to be the standard or routine formulas. Cow's milk is modified to make it easier to digest and nutritionally complete for the infant.

Soy formulas are also nutritionally complete formulas and may be issued upon request from parents. Soy formulas contain no cow's milk and use soy beans as the base. Soy formulas may be fed to infants who have or are likely to develop an allergy or intolerance to cow's milk formula.

What is a contract formula?

WIC enters into a contract with formula companies every 2 years to provide their products to WIC participants. These are referred to as the contract formulas. WIC receives a cash refund for all the contract formula purchased by WIC participants. This money is used to provide WIC services. WIC does not receive any cash refunds for other formulas, which is why it is important that all infants receive the contract brands of formula unless there is a specific condition that prohibits it. Some WIC contracts can be in effective for up to 5 years.



The contract formulas provided by the WIC Program for babies who are either totally or partially bottle fed are:

1. Enfamil with Iron (Mead Johnson) which is milk-based.
2. ProSobee (Mead Johnson) which is soy-based.

Most infants will do well with either a milk- or soy-based formula that is iron-fortified.

What is a non-contract formula?

A non-contract formula is any other WIC-approved milk- or soy-based formula. All standard milk-based formulas (Enfamil, Good Start, Similac, Lacto-Free) are very similar in composition; likewise all standard soy formulas (Alsoy, Isomil, ProSobee) are similar in composition. Doctors and nutritionists agree that most babies using a milk- or soy-based formula grow

Food packages for milk and soy formulas are available starting with the letters GN, HN, IN, JN, KN, or LN.

Physician's Authorization:

A WIC form to be completed and signed by the physician that identifies the product, length of time needed, and the medical need.

Transition Food Package:

A food package designed to transition the WIC participant from one formula to another. Transition food packages generally cover half contract and half non-contract formula.

well on any infant formula. Local agencies must limit the use of non-contract milk and soy formulas. Non-contract milk and soy formulas are allowed only in **rare** circumstances, with a physician's authorization and the approval of the WIC nutritionist or nurse. All infants must have tried the contract formulas before they can be issued a non-contract formula. Food packages are available that contain non-contract formulas. "Transition" food packages are also available. These may be assigned to assist in transitioning the baby from a non-contract to a contract formula.

Are other formulas available?

Sometimes there is a need to issue a special formula. There are a variety of special formulas available, which may be issued only if there is a written authorization from the infant's physician and the WIC RD/RN. The Physician's Authorization must be kept in the participant's chart. These formulas are used for infants who have medical or metabolic problems which affect their nutritional needs and/or their ability to digest regular formulas. It is very important that these infants are seen by a physician who can continually reevaluate the need for a special formula. Food packages starting with the letters GS, HS, IS, JS, KS, or LS contain "special" formulas for infants.

When can ready-to-feed formula be issued?

Ready-to-feed (RTF) formula means that it is ready to use as is and requires no mixing with water. The use of RTF formula is appropriate under certain circumstances. However, due to its high cost, RTF formula should be issued only when necessary. Powdered or concentrated formulas are nutritionally equivalent to RTF formula but are considerably less expensive. Powdered or concentrated formula should be used whenever possible.

Ready-to-feed (RTF) formula may be issued only under the following special circumstances and the reason for issuance must be documented in the chart:

1. The family's water supply is contaminated and unsafe for consumption. If this is a temporary problem, powdered or concentrated formula should be issued once the problem has been alleviated.
2. There is significant doubt about the caretaker's ability to correctly reconstitute the powdered or concentrated formula.



2-pound can

Iron-deficiency Anemia:

Condition in which there are small, pale blood cells resulting from an iron deficiency.

Iron RDA for Infants:

0-6 months = 6 mg/day
6-12 months = 10 mg/day
Most standard formulas contain about 1.8 mg/100 calories of formula.

3. The family will be traveling and on the road for an extended period of time. RTF formula can be issued on a temporary basis.

Can two-pound cans of formula be purchased?

Yes, two-pound cans of formula can be purchased if the WIC checks are made out for them. Currently only Enfamil with iron is available in two-pound cans. It is always good to encourage the use of two-pound cans because it means fewer containers, which benefits the environment with less waste, and also saves the WIC Program money. Two pound cans are not available statewide. Make sure a store sells the two-pound cans before issuing this food package to a participant.

Why is iron-fortified formula required?

Iron-fortified formula is required because The American Academy of Pediatrics, Committee on Nutrition, recommends that non-breast fed infants receive iron-fortified formula for the entire first year of life. The iron in the formula helps to prevent iron-deficiency anemia. Iron deficiency is the most common nutritional deficiency among young children. The consequences may include impaired growth, development, behavior, and intellect. Since the consequences may persist even after the anemia is resolved, it is very important to prevent iron deficiency.

You will find that not all physicians or parents agree with this recommendation. Many claim that the iron in formula causes gastrointestinal problems such as constipation, colic, spitting up, vomiting, or diarrhea. However, studies have shown this to be untrue. In one study, two formulas were fed to infants—one formula with iron and one without. Mothers kept a daily record of all symptoms. The mothers did not know which formula their babies were receiving. The records revealed no difference in number of stools per day, description of stools (except color), frequency of colic, spitting up, or vomiting. All infants experienced these symptoms to some degree regardless of the type of formula they were given. The study concluded that iron-fortified formula did not cause an increase in the symptoms.

Some doctors may also believe that infants simply do not need the iron-fortified formula starting at birth. This is true, in part, since a full-term infant is born with enough iron stores to last for the first 4-6 months of life. Preterm babies are born with iron stores that last about 2 months. However, the WIC Program supports starting iron-fortified formula at birth (for the non-breastfed infant) for the following reasons:

- ✓ Even though the full-term infant has adequate iron stores to age 4 months, the young infant is able to absorb the iron during this period and store it for later use. Thus, the iron from formula during the first 4-6 months may protect the infant from iron-deficiency anemia later in life.
- ✓ WIC is a preventive program that serves a high risk population. The highest incidence of anemia occurs among the lower socioeconomic groups such as those served by WIC.
- ✓ WIC participants tend to be mobile and seek health care infrequently. An infant begun on low-iron fortified formula with the intent to later change him to formula with iron, may be lost to follow up before the transition can occur. This could result in an inadequate intake of iron and contribute to the development of iron-deficiency anemia.

Low-Iron Formula

When is low-iron fortified formula allowed?

Low-iron fortified formula may be issued to infants under 4 months of age on an individual basis for the small number of infants with medical conditions that necessitate restricting iron intake or using a formula that has less iron than the WIC standard (10 mg iron/liter). If necessary, staff may assign a "transition" food package containing half low-iron and half regular iron-fortified formula.

Low-iron fortified formula may only be issued if a physician has completed and signed the "Physician's Authorization for Low-Iron Fortified Formula." (Locate this form in your clinic.) It is important that physicians sign this form rather than writing out their own prescription since the form is intended to update physicians about the appropriate use of non-iron fortified formula.

WIC is not able to issue low-iron formula after 4 months of age, even with a physician's authorization, unless the child is diagnosed with hemolytic anemia, iron overload secondary to chronic blood transfusions, or inherited blood disorders such as thalassemia. The original form should be kept in the infant's chart. All cases should be brought to the attention of the nurse or nutritionist in your WIC clinic.

What else is important to tell a mother who has chosen to bottle feed?

Either breast milk or iron-fortified formula should be fed for the entire first year. Tell parents that during bottle feedings, the infant should be held and cuddled. Parents should never prop the bottle, let the baby lie flat while sucking, or put the baby to bed with a bottle. These practices can cause the baby to choke or have ear infections.

**Self
Check**



QUESTIONS

1. True or False? It is part of the Federal Regulations for the WIC Program that pregnant women be encouraged to breast-feed, unless a health problem would prevent it.
2. True or False? WIC staff should produce a WIC check for exclusively breastfeeding infants less than 4 months old.
3. Breastfeeding is considered the ideal way to feed young infants because: (check all that apply)
 - a) it provides immunizing protection against certain diseases.
 - b) it is the only food that infants grow well on.
 - c) it is clean and not easily contaminated.
 - d) it does not supply all the nutrients needed by the infant.
 - e) it promotes a close, affectionate relationship between mother and infant.
 - f) it is a nutritionally complete food for the first 4-6 months.
4. Which formulas require a physician's written prescription before they can be issued to an infant on the WIC Program?
 - a) contract soy formula
 - b) "special" formulas
 - c) contract cow's milk formula
 - d) non-contract formulas
5. True or False? The iron in iron-fortified formula causes symptoms such as colic, spitting up, diarrhea, or constipation.
6. True or False? For non-exclusively breastfed infants, the WIC Program recommends that iron-fortified formula be fed to infants from birth through the first year of life.
7. True or False? Even though full-term infants are born with adequate iron stores through 4 months, they can absorb and store iron during the period from birth to 4 months and it may help protect them against iron-deficiency anemia later in life.
8. True or False? Low-iron fortified formula can never be issued to infants on the WIC Program.



ANSWERS

1. True
2. True
3. a, c, e, f
4. b, "special" formulas and d, non-contract formulas
5. False
6. True
7. True
8. False, low-iron fortified formula may be issued to infants under 4 months of age if the infant's physician completes and signs the "Colorado WIC Program's Authorization for Low-Iron Fortified Formula"

How much formula does an infant need to drink each day?

TABLE 1
Range of Daily Intake of Formula*

<u>Age in Months</u>	<u>Low</u>	<u>Average</u>	<u>High</u>
1	14 oz.	20 oz.	28 oz.
2	23 oz.	28 oz.	34 oz.
3	25 oz.	31 oz.	40 oz.
4	27 oz.	31 oz.	39 oz.
5	27 oz.	34 oz.	45 oz.
6	30 oz.	37 oz.	50 oz.
7	30 oz.		32 oz.
8	29 oz.		31 oz.
9	26 oz.		31 oz.
10	24 oz.		32 oz.
11	24 oz.		32 oz.
12	24 oz.		32 oz.

**Adapted from: Owen, A.L.; Feeding Guide. A nutritional guide for the maturing infant. Health Learning Systems, Bloomfield, New Jersey, 1979. This information was compiled from a study of infants who were all given cereal starting at 6 months of age and other solids at 8 months of age.*

The table in the margin is a guide to the amount of formula infants of varying ages can be expected to drink daily. Note that this information was compiled from a study of infants who were all given cereal at 6 months of age and other solids at 8 months of age. The intake of formula among healthy infants varies widely, and this table should only be used as an approx-imate guide. It is very important to monitor the growth of the infant to judge whether an appropriate amount of formula is being given. In general, an infant should be drinking an amount of formula within the range listed for his age.

The WIC Program provides a maximum of 806 ounces (reconstituted) of formula per month. This equals about 26-27 ounces of formula per day. As you can see from Table 1, this may not be enough formula to provide for the infant's total needs at certain ages. However, remember that WIC is a supplemental nutrition program and does not provide the total diet for any participant. Point out to WIC mothers that they may need to purchase some additional formula on their own.

Are breastfed infants allowed supplemental infant formula?

Ideally, the breastfed infant should require no supplemental formula. When lactation is going well, supplemental formula is not needed, and when it is not going well, it may aggravate the problem. Giving formula to moms to use after a nursing session as a "top off" to the feeding may cause lactation fail-ure. It would be better to put the infant to the breast more often or switch back to the first breast if the baby is hungry.

For breastfed infants **less than a month old**, it is recommended only 1 can of powdered formula be issued and for infants **less than four months old**, it is highly recommended that only 4 cans of

powdered formula be issued each month. This is due to the detrimental effect formula can have on the breast milk supply before breastfeeding is well established. However, if special circumstances exist where the infant needs additional formula, such as partial weaning, the staff person can issue more formula to the 0-4 month old infant. Each case should be evaluated separately with the goal being to support breastfeeding as long as the mother wants to continue.

However, supplemental formula may be issued when deemed necessary by the WIC staff. For breastfed infants **older than four months of age**, the maximum amount of formula can be issued. Giving this much formula would be appropriate only when the staff person identifies some special condition or circumstance affecting the breastfed baby's nutritional needs. Examples of special conditions are: (1) final stage of weaning, or (2) mother working or going to school (who is not pumping her breasts) and can provide only one or two nursings per day.

Guidelines for Formula Issuance to Partially Breastfed Infants

The following chart provides guidelines for the amount of formula to issue to partially breastfed infants.

BF Infant's Average Daily Formula Intake	Number of cans of 16 oz. Pwd. Formula	Number of cans of 14 oz. Pwd. Formula	Number of cans of 12 oz. Pwd. Formula
1 ounce	1	1	1
2 ounce	1	1	1
3 ounce	1	1	2
4 ounce	1	2	2
5 ounce	2	2	2
6 ounce	2	2	3
7 ounce	2	3	3
8 ounce	3	3	3
9 ounce	3	3	4
10 ounce	3	3	4
11 ounce	3	3	4
12 ounce	4	4	5
13 ounce	4	4	5
14 ounce	4	5	5
15 ounce	4	5	6
16 ounce	5	5	6
17 ounce	5	6	7
18 ounce	5	6	7
19 ounce	5	6	7
20 ounce	6	7	8
21 ounce	6	7	8
22 ounce	6	7	8
23 ounce	6	7	9
24 ounce	7	8	9
25 ounce	7	8	9
26 ounce*	8*	9*	10*

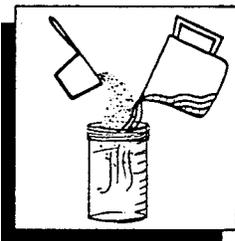
*Mothers of infants who receive a full-formula package are also entitled to receive a woman's partially-breastfeeding package. However, only one month of FIs should be issued at a time so that a mother's breastfeeding status can be evaluated on a monthly basis. A mother needs to understand that it is very unlikely that she will be able to maintain a milk supply for more than a month if her infant is consuming a full-formula package.

Additional Guidelines for Issuing Formula to Partially-Breastfed Infants

1. Breastfeeding women should receive information about the potential impact of formula on lactation before samples or formula checks are given.
2. Provide formula checks or samples only when specifically requested by the mother of the breastfed infant. Offering formula to a breastfeeding woman who has not requested it undermines her fragile confidence that she can breastfeed successfully, particularly in the first few weeks. Also, she may find it hard to turn down the free formula even though she had not planned to use it.
3. Minimize the use of supplemental formula for breastfeeding infants by providing only the amount of formula that the infant is consuming at the time of check issuance. During the first month of life, little or no formula should be needed to a maximum of 8 oz. per day.
4. Breastfeeding mothers who wish to supplement should be issued powdered rather than concentrate formula.

Why is powdered formula encouraged for breastfed infants?

Due to its longer storage life, formula in the powdered form is more appropriate for breastfed infants than the liquid concentrate. Once opened, the liquid concentrate may only be stored (under refrigeration) for forty-eight hours. This means that a mother may feel "pressured" into giving her infant two 6-ounce bottles per day in order to use up the formula, or that she may end up throwing unused formula away. The powdered formula gives her the flexibility to mix exactly the amount of formula she wants each day.



A common concern is that the powdered formula is difficult for mothers to mix. It is true that using powdered formula may involve extra work. It is important to educate mothers about why the powdered formula is more appropriate. Also, it is very important to follow the mixing directions exactly. For some formulas, the water must be added to the bottle first and not the other way or clumping will result. All contract WIC formulas are available in the powdered form and food pack-ages are available in graduated amounts of powdered formula.

**Self
Check**



QUESTIONS

9. Looking back at Table 1, what would you think about a 2 month old bottle-fed infant who is drinking 20 oz. of formula per day?
- ___a) This amount is probably adequate as long as it is iron-fortified formula.
 - ___b) This amount is probably too low and the infant's weight gain and growth should be checked.
 - ___c) This amount is definitely too low and the infant needs at least 28 oz. per day.
10. Sally Jones has a 3 month old bottle-fed infant on the WIC Program who is not yet eating solids. Sally phones the WIC clinic one day to say that it has only been 3 weeks since she picked up her last WIC checks, and she is already out of formula. She thinks there must have been a mistake in the amount of formula listed on her checks. What would you tell Sally?
- ___a) She is right; the amount of formula listed on her checks probably was too low.
 - ___b) She is probably feeding her infant too much formula and needs to cut back.
 - ___c) WIC is a supplemental nutrition program and does not provide the total diet for any participant, including infants. She may need to purchase some additional formula on her own.
11. Which type of formula is encouraged for partially-breastfed infants who receive supplemental formula?
- ___a) Liquid concentrate
 - ___b) Powdered
 - ___c) Ready-to-feed
- Why is this type of formula encouraged?



ANSWERS

9. b
10. c
11. b; Due to its longer storage life, powdered formula is more appropriate for breastfed infants. It gives the mother the flexibility to mix exactly the amount she needs each day and will avoid encouraging her to give more formula to the baby or wasting formula.



CEREAL

Why is the introduction of cereal delayed until the infant is at least 4 months of age?

Infants should not be given solid foods until at least 4-6 months of age. There are several good reasons for this:

1. There is no nutritional need for solids before 4-6 months. Breast milk or iron-fortified formula supply needed nutrients.
2. The balance of nutrients, calories, and liquid in breast milk or iron-fortified formula is ideally suited to the infant's needs. Introducing solids too early will disrupt this ideal balance. Solids are nutritionally inferior at this point in the infant's life and should not replace any breast milk or formula.
3. Developmentally the infant is not yet ready for solids before 4-6 months of age. The very young infant's only feeding skill is an instinctive ability to suck. The infant cannot yet sit up or even hold his head up. The only appropriate feeding at this age is breastfeeding or bottle feeding (through a nipple).
4. The infant may be more prone to food allergies if solid foods are introduced too early. However, by 4-6 months of age, the infant is becoming ready developmentally to eat solids given by a spoon if:
 - The infant is able to sit up and hold his head up; he can lean forward and open his mouth to indicate an interest in food or turn his head away to indicate fullness.
 - The infant's ability to chew and swallow are beginning to develop.
 - The infant's ability to grasp objects and bring them to her mouth is developing - allowing self feeding of finger foods.
 - The infant's ability to digest other foods is increasing.

How should new foods be introduced?

When solids are introduced, new foods should be tried one at a time and fed for about a week before another food is added. Early solid foods should be plain. Mixed or combination foods should be avoided until the infant is older. This approach allows parents to watch for signs of allergy or intolerance such as vomiting, diarrhea, abdominal pain, cough, running nose, wheezing, and skin itching or rash. If it appears that an infant is allergic or intolerant to a food, it should be removed from the diet and tried again when

First Cereals for Infants:

Rice cereal should be the first choice since it is least apt to cause an allergic reaction. Oat or barley cereal can be tried next. Wheat cereal should be delayed until one year of age since infants are commonly allergic to it.

the infant is older. However, if an infant has shown a very strong or severe reaction, the food should never be tried again without a physician present.

Iron-fortified infant cereal is a good first food because it is well accepted, is not likely to cause an allergic reaction and is a good source of iron. For these reasons, the WIC Program authorizes the issuance of infant cereal starting at 4 months.

How do I determine how much cereal to offer a participant?

In Colorado, packages with 1 or 2 boxes are issued for months 4 and 5. When infants are first introduced to solids they generally consume very small amounts. Many caregivers may not be able to use up 2 boxes a month at first. Offer to provide a food package with 1 box of cereal or explain that they may buy just one box (even though two appear on their WIC check) until they are ready for both boxes. It is important to avoid wasting WIC foods.

At 6 months of age, the cereal allotment can be increased to 3 boxes at the request of the caregiver. Food packages starting with LN or LS contain 3 boxes of cereal in addition to formula and infant juice and can be assigned when the infant turns 6 months old. A "Breastfeeding - no formula" food package (LT959) should be assigned to the baby that is totally breastfed. It contains 3 boxes infant cereal, but no formula.

Can adult cereal be purchased with infant checks?

No. Adult cereal cannot be purchased with checks that specify infant cereal and only infant cereal may be issued until the child is older than 12 months. Infant cereal must be single grain and cannot contain added fruit. Only the dry cereal is allowed due to the higher cost of the "wet pack" cereal in jars.

JUICE

Why is the introduction of juice delayed until 7 months?

There are several good reasons for delaying the introduction of juice until 7 months:

1. The American Academy of Pediatrics recommends that feeding of fruit juice in a bottle should be avoided due to the common tendency to use a bottle as a pacifier. The use of the bottle as a pacifier may contribute to extensive decay of



baby teeth ("nursing bottle mouth") by allowing sweet liquids such as juice to pool around the teeth for long periods of time. Infants begin to acquire the skills for drinking from a cup at 6-8 months of age. At this age, the infant will be able to sit with support and will be developing the neuromuscular control over the head, neck, and arms to lift a cup to his mouth and swallow.



2. It is important to consider that mothers may feed other sweet liquids, such as Kool-Aid anyway—even if we wait until 7 months to issue juice. These concerns should be addressed by educating parents about why it is important to feed juices only from a cup and why sweet liquids, such as Kool-Aid or punch, should be avoided. Start educating mothers early, while they are still pregnant, about sound infant feeding practices.
3. Although juice is a good source of vitamin C, breast milk or infant formula provide adequate vitamin C for the first 7 months. There is no nutritional need for juice during the first 7 months of life.
4. If juice is fed in a bottle, there may also be a tendency to "over use" it. Over feeding with juice is a common error. Babies don't need the juice and it may spoil their appetite for formula, breast milk or other foods. About 2 ounces per day of juice is plenty.

Federal regulations allow WIC to provide juice at 6 months of age for caregivers requesting this option. However, for the reasons described above, the majority of infants may wait until 7 months of age to receive juice.

**Self
Check**



QUESTIONS

12. a) At what age should infants be introduced to solids? _____

- b) Why should solids be delayed until this age?

13. True or false? When new foods are introduced they should be tried one at a time and fed for about a week before another food is added.
14. Iron-fortified rice cereal is a good first food because: (check all that are correct)
- a) it is a good iron source
 - b) it is an excellent source of vitamin C
 - c) it is a single grain cereal
 - d) it is not apt to cause an allergic reaction
15. True or false? Wheat cereal is the first solid food that should be introduced to infants at 4-6 months of age.
16. True or false? Infants on the WIC Program can never receive more than 2 8-oz boxes of infant cereal.
17. Why is the introduction of juices delayed until at least 7 months?

18. True or false? Juice should be fed to infants in a bottle, not a cup.
19. Check (✓) the circumstances under which ready-to-feed formula may be issued:
- a) if the family water supply is unsafe
 - b) if the mother prefers RTF formula
 - c) if a working parent requests it because it is more convenient
 - d) if there is doubt about the caretaker's ability to properly mix the powdered or concentrated formula
 - e) if the family is traveling and has no refrigeration
20. True or false? Ready-to-feed formula costs about the same as concentrated formula but is much more expensive than powdered formula.



ANSWERS

12. a) 4-6 months
b) Nutritionally, there is no need for solids any sooner. Breast milk or iron-fortified formula are ideally suited nutritionally for the infant and solids are nutritionally inferior at this point. Developmentally, the infant is not ready for solids until 4-6 months.
13. True
14. a,c,d
15. False (rice cereal should be introduced first)
16. False; 3 boxes may be issued at 6 months of age if the parent wants it and can use it. (Food packages starting with "LN" contain 3 boxes of infant cereal)
17. To avoid feeding juice in the bottle and the tendency to use sweet liquids in the bottle as a pacifier which can lead to nursing bottle mouth. Also there is no nutritional need for the vitamin C in juice since breast milk or formula supply enough.
18. False
19. a,d,e
20. False; ready-to-feed is much more expensive than either concentrated or powdered formula.



We have covered a lot of information on the Infant Food Packages. Take a few minutes to review the chart on the following pages which summarizes the infant food packages and the underlying nutrition principles.

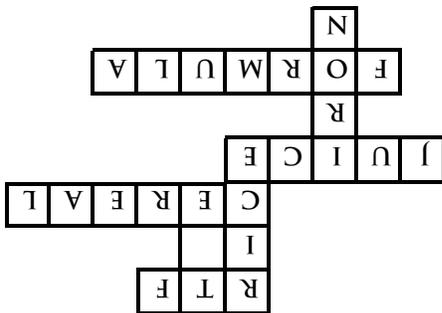
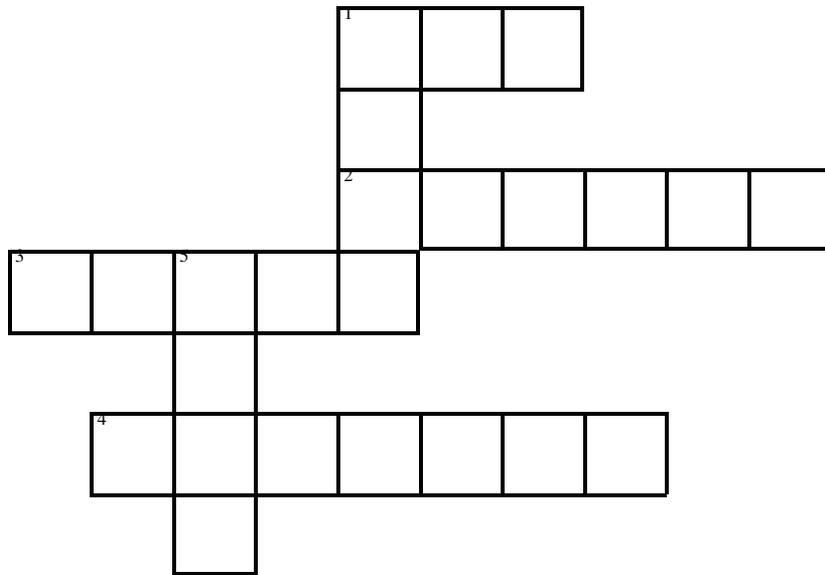
But first, try this crossword puzzle . . .

ACROSS

1. A type of formula that may be issued if a family's water supply is unsafe.
2. The first solid food that infants should receive.
3. A liquid that should only be given to infants in a cup, not a bottle.
4. Breast milk or _____ should be fed for the entire first year.

DOWN

1. The kind of cereal (whole grain) which is best to introduce first.
5. Formula given to infants should be fortified with _____.



Summary of the Infant Food Package Guidelines

<u>Nutrition Principle</u>	<u>Rationale</u>
1. Breastfeeding is encouraged for all WIC infants.	1. Breast milk is nutritionally complete, easy to digest, requires no mixing or preparation so it is clean and not easily contaminated or subject to incorrect mixing; it provides immunizing protection, and it encourages a close relationship between mother and baby.
2. Iron-fortified commercially prepared formula is provided.	2. These formulas are the best alternative to breast milk. They are nutritionally complete for the first 4-6 months. The iron in the formula is important to help prevent iron-deficiency anemia.
3. Formula in the powdered form is issued for breastfed infants if supplemental formula is needed.	3. Powdered formula provides the flexibility to mix exactly the amount of formula wanted; it is less apt to lead to waste or over supplementation of formula.
4. Cereal issued to infants must be plain, single grain, and iron-fortified.	4. When introducing solids to infants, plain (not mixed or combination) foods should be used to make it easier to identify intolerances or allergies; good iron sources in the diet are important for infants.
5. Food packages with infant cereal cannot be issued until 4 months of age.	5. Infants have no nutritional needs for solids until 4-6 months of age; developmentally, they are not ready for solids until 4-6 months of age.
6. One to two boxes of cereal are issued to infants at 4-5 months of age; at 6 months, 1-3 boxes of cereal can be issued.	6. When first being introduced to solids, infants typically eat small amounts. As they grow older and learn to eat more solid foods, the amounts offered can be increased.
7. Food packages containing juice can be started at 7 months of age.	7. To avoid the common tendency to use sweet liquids in the bottle as a pacifier, juice should be fed only in a cup, not in a bottle.
8. Ready-to-feed (RTF) formula may only be issued under special circumstances.	8. RTF formula is considerably more expensive than powdered or concentrated formula; because WIC serves low income families, it is important to teach economic shopping habits.

Great! You have completed the Infant Food Package section of the module. Next, we will discuss the food packages for children.

III. Child Food Packages

The allowable foods for children on the Colorado WIC Program and the monthly maximum amounts are summarized below:

Substitutions for Fresh Milk:

*Cheese, powdered milk, or canned milk may be substituted for fresh milk at the rate of:

1 lb. of cheese 3 quarts of milk
 1 qt. of powdered milk 1 quart of milk
 1 12 oz. can evaporated milk 1 quart of milk

Several tailored food packages are available containing powdered and/or evaporated milk with or without fresh milk.

	Adult Juice	Fresh* Milk	Eggs	Peanut Butter/ Beans	Adult Cereal
Child 1-2 years	6 12-oz cans frozen conc -or- 6 46-oz cans single strength	21 qts <u>whole</u> milk	2 doz	18-oz jar peanut butter -or- 1# beans	28 ounces
Child 2-5 years	6 12-oz cans frozen conc -or- 6 46-oz cans single strength	21 qts	2 doz	18-oz jar peanut butter -or- 1# beans	36 ounces
Overweight Child	A lowfat food package is strongly recommended for overweight children over two years of age. The allowable foods are the same as above except that: 1. Lowfat milk must be issued (1%, buttermilk, or skim). 2. Only 1 pound of cheese should be issued. (The maximum cheese allotment is 2 pounds per month: two pounds of <u>reduced fat</u> cheese may be offered.) Use of reduced fat cheese is encouraged. 3. Beans instead of peanut butter are issued.				

Why are these particular foods provided in the WIC food packages for children?

During the period from 1-5 years of age, a child grows and develops rapidly. Significant brain growth is going on, bones and teeth are developing, and blood and muscle tissues are enlarging. Nutrient needs are high and deficiencies can have serious and long lasting effects. Studies have shown that children from low income families are particularly vulnerable to health and nutrition problems such as anemia, poor growth, and dental problems. That is why the WIC Program targets this population to receive benefits. By providing nutritious foods and nutrition education, we hope to prevent problems and correct those already present.



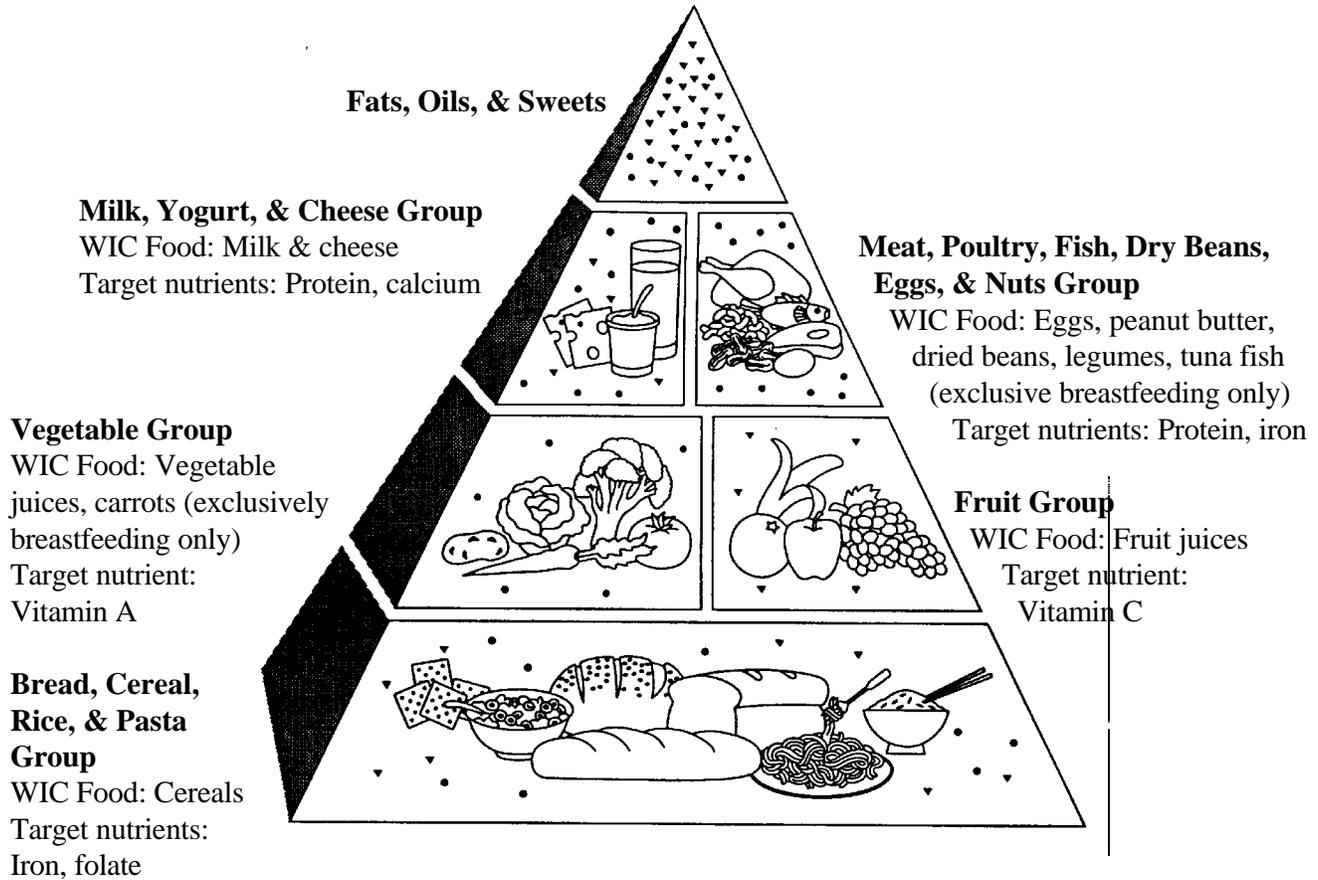
The WIC foods were chosen because they are very nutritious. They supply nutrients that are particularly needed by young, growing bodies and ones that have been shown to be inadequate in the diets of low income families. The nutrients emphasized in the WIC foods are: protein, calcium, vitamin A, vitamin C, folate, and iron. However, the WIC foods supply many other nutrients as well. The WIC foods include choices from each of the food groups and so supplement a well-balanced diet.

Study the Food Guide Pyramid on the next page which lists: 1) the food group represented, 2) each WIC food, 3) the major nutrients supplied and their role.

You can see that eating WIC foods each day will help children achieve an adequate daily intake from the food guide pyramid.

WIC Foods For Children

Key to Symbols:	
● Fats	◻ Sugars



Major Nutrients and Some of Their Major Roles

Protein	For growth and repair of body tissue
Iron	For preventing anemia, carrying oxygen in the body
Calcium	For strong bones and teeth
Vitamin A	For healthy eyes and skin
Vitamin C	For wound healing, fighting infections
Folate	For making new cells

Self
Check



QUESTIONS

21. The nutrients emphasized in the WIC foods are:

- | | |
|---------------------------------------|-----------------------------------------------------|
| <input type="checkbox"/> a) protein | <input type="checkbox"/> g) fat |
| <input type="checkbox"/> b) vitamin E | <input type="checkbox"/> h) vitamin B ₁₂ |
| <input type="checkbox"/> c) calcium | <input type="checkbox"/> I) vitamin A |
| <input type="checkbox"/> d) magnesium | <input type="checkbox"/> j) carbohydrate |
| <input type="checkbox"/> e) vitamin C | <input type="checkbox"/> k) folate |
| <input type="checkbox"/> f) iron | <input type="checkbox"/> l) water |

22. For each WIC food below, match the major food group in which it belongs:

- | | | |
|----------------------------|--------------------------|------------------------------------------------------------|
| a) cereal | <input type="checkbox"/> | 1) milk, yogurt, cheese |
| b) milk | <input type="checkbox"/> | 2) meat, poultry, fish,
dry beans, eggs, &
nut group |
| c) juice | <input type="checkbox"/> | 3) fruit group |
| d) peanut butter | <input type="checkbox"/> | 4) vegetable group |
| e) cheese | <input type="checkbox"/> | 5) breads, cereals, rice,
and pasta |
| f) eggs | <input type="checkbox"/> | |
| g) legumes/
dried beans | <input type="checkbox"/> | |
| h) carrots | <input type="checkbox"/> | |

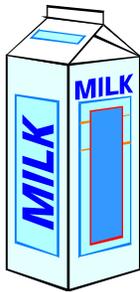


ANSWERS

21. a,c,e,f,i,k

22. a) 5
b) 1
c) 3
d) 2
e) 1
f) 2
g) 2
h) 4

=



MILK

Why is the milk allotment for children set at 21 quarts?

The WIC maximum of twenty one quarts per month (15 quarts of milk and two pounds of cheese—1 pound of cheese is equal to 3 quarts of milk) is enough milk to meet the young child's nutrient needs without supplying an excess amount which might spoil the appetite for other foods. An adequate intake of calcium is particularly important for the young child since bones and teeth are growing during these years.

Dairy products are the primary source of calcium in the diet. The recommended amount of milk is 3 cups per day to meet the calcium requirements for children 1-5 years of age. On the other hand, the American Academy of Pediatrics recommends that milk intake should not be much higher than 3 cups per day once the intake of solids has been well established.

Milk is a highly nutritious food, but if fed in excess it can prevent children from learning to eat a variety of solids and may result in an inadequate diet. Milk is a particularly poor source of iron and vitamin C. Excess milk intake, coupled with an inadequate intake of solid foods, may lead to iron-deficiency anemia in young children.

Why are lowfat milks (including nonfat powdered milk) not allowed until 2 years of age?

Lowfat milk, skim milk, powdered, and nonfat milk should not be used until a child is at least two years old even if the child is overweight. This includes Lactaid and acidophilus milks because they are also lower in fat. Since the calorie content is significantly lower than other milks, it takes more milk to feel full and satisfied. This may reinforce habits of overeating. It is also important for infants to have a source of essential fatty acids (specifically, linoleic acid) in their diet. Since many infants and young toddlers eat very few foods containing fat, the use of whole milk provides the fats necessary for proper growth and development.

As you can see (side bar), cup for cup, lowfat milk is significantly lower in fat and calories than whole milk. Fat supplies needed calories and is necessary for myelination (development of the protective sheath) for nerves. If skim or nonfat milk is used, it may result in a diet which is very low in fat.

Fat and Calorie Levels of Different Milks:

The fat and calorie levels in 1 cup of whole, reduced fat (2%), buttermilk, skim milk, and nonfat dry milk are listed below:

	<u>3.25%</u> <u>Whole</u>	<u>2%</u>	<u>1%</u>	<u>1%</u> <u>Butter-</u> <u>Milk</u>	<u>Skim</u>	<u>Nonfat</u> <u>Dry</u> <u>Milk</u>
Fat (gm)	8	4.9	2.6	2.2	0.4	.17
Calories (kcal)	150	120	102	99	85	82
Cholesterol (mg)	33	18	10	9	5	4
Calcium (mg)	291	296	300	285	300	283

Source: Bowes & Church's *Food Values of Portions Commonly Used*, Sixteenth Edition (1994)



Lactose Intolerance:

An inherited or acquired inability to digest lactose due to failure to produce the enzyme lactase. People vary widely in the amount of lactose they can tolerate.

Can 2% (reduced fat) milk be safely used for children 1-2 years of age?

Ideally, whole milk should be used until a child is 2 years old. However, 2% milk can be used for children 1-2 years old if the following conditions are met and documented by the WIC nutritionist or nurse:



1. The child's growth status is optimum. For children low on the growth chart or children who have an irregular pattern of growth, it is better to use whole milk.
2. The child is eating a mixed diet including foods containing fat such as cheese, peanut butter, margarine or butter, fried foods, etc . . .

For participants who request use of 2% milk for their child, be sure to review the above points. Stress the importance of adequate fat and calories in the child's diet. Review with the caregiver how foods such as cheese and peanut butter can be used at mealtimes and for snacks. Food packages containing reduced fat milk for toddlers are found within the tailored food packages.

Can lactose-reduced milks be issued to children 1-2 years of age?

Under special circumstances lactose-reduced milk may be issued to 1-2 year old children. Since they are only available in reduced fat and lowfat varieties the above guidelines for issuing 2% milk need to be followed.

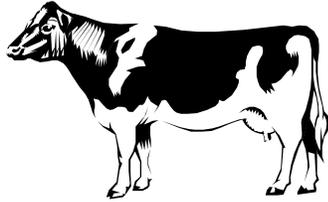
What kind of milk should be recommended after 2 years?

After 2 years of age it is recommended that lowfat milk be encouraged for all WIC families, unless underweight or poor growth is present. Use of lowfat milk helps to reduce the overall fat and cholesterol level in the diet. This is a healthy lifelong eating habit of benefit to all family members. Lower levels of fat and cholesterol in the diet are associated with a reduced risk of chronic diseases such as coronary heart disease and cancer. Encouraging the entire family to switch to lowfat milk is a valuable nutrition education message.

Unless a food package specifies differently (as in lactose-reduced and lowfat food packages), fluid milk (for children over 2 years of age) can be purchased as whole, reduced fat (2%), lowfat, or nonfat. In addition, buttermilk, and acidophilus can also be

purchased.

Can lactose-reduced milk, buttermilk or acidophilus be purchased with a standard food package?



A participant can purchase up to ½ gallon of lactose reduced milk with a regular food package. If more than one ½ gallon is desired, issue a lactose-reduced food package. If buttermilk or acidophilus are preferred, WIC staff should issue a food package listing milk in quarts, since these milks are not routinely available in larger size containers.

Is fluid milk the only choice a participant has?

No, a participant may choose cheese, powdered, or canned evaporated milk as a substitute for fresh milk. Several options are available within the tailored food packages.

Cheese may be substituted at the rate of one pound of cheese for three quarts of fluid milk up to a maximum of three pounds. Milk and cheese are both dairy products and supply similar amounts of the same nutrients. One pound of cheese contains about the same amount of calcium as 3 quarts of milk. Cheese is offered as an alternative to milk to increase the variety in the WIC food package and because cheese is a well liked food.

One quart of powdered milk may be substituted for each quart of fresh milk. Participants may not be familiar with using powdered milk so it is helpful to give them suggestions for using it, such as:

1. making yogurt
2. extending the fresh milk supply by mixing it half and half with reconstituted powdered milk
3. using it in cooking—especially cream soups, custards, puddings, or cheese sauce
4. making "milk shakes" with powdered milk, crushed ice, and any variety of fruits, fruit juices, and flavorings (e.g., vanilla or cinnamon)

Canned evaporated milk can be used in ways similar to powdered milk. It comes in 12 ounce cans and may be substituted for all or a portion of a participant's fresh milk allotment.

Guidelines for Substituting Canned Evaporated Milk for Fresh Milk

Fresh Milk Quarts	Evaporated Milk 12 oz cans	Fresh Milk Quarts	Evaporated Milk 12 oz cans
1	1	15	16
2	2	16	17
3	3	17	18
4	4	18	19
5	5	19	20
6	6	20	21
7	7	21	22
8	8	22	23
9	9	23	24
10	10	24	26
11	11	25	27
12	13	26	28
13	14	27	29
14	15	28	30

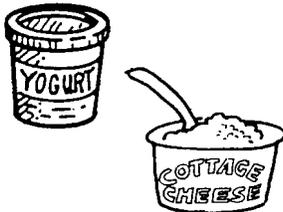
What size container should milk be purchased in?

Milk must be purchased in the size cartons indicated on the participant's check.

Why is there a 3-pound maximum limit on the amount of cheese that can be issued?

Because WIC serves a low income population, it is important to teach economic shopping habits to participants. Cheese is an expensive food and it costs more to get the same nutrients from cheese as from milk. In particular, cheese is not as good a source of calcium as milk and is higher in sodium (salt) and fat. For these reasons, it makes sense for WIC participants to be taught not to rely too heavily on cheese in their diet. Conversely, cheese is a tasty, nutritious, and popular food item with varied uses in cooking. A three-pound limit on cheese restricts the use of this expensive food item by our low income participants but still allows flexibility and variety in the food package.

NOT Allowed on WIC:

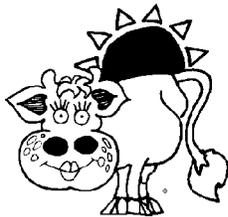


Why can't foods such as yogurt or cottage cheese be substituted for milk?

Yogurt is not authorized for use on the WIC Program because it generally is not fortified with vitamin D and is more expensive than milk. Some yogurt costs as much per cup as a quart of milk. However, participants are free to use the milk supplied by the WIC Program to make their own yogurt at home.

Cottage cheese, while nutritious, is lower in calcium, is not fortified with vitamin D, and is more expensive than milk. Participants can be encouraged to buy these foods on their own if they enjoy them.

Self
Check



QUESTIONS

23. True or false? The WIC food package for children supplies enough milk to meet their calcium requirements.
24. Children 1-5 years old need ____ cups of milk per day.
25. True or false? In general, children should ideally drink whole milk, not skim milk, until 2 years.
26. True or false? Milk can be purchased in any size container the participant prefers.
27. List 2 suggestions for using powdered milk.
- _____
- _____
28. True or false? Yogurt and cottage cheese are not authorized foods because they are too high in protein and calcium.
29. Why is there a 3-pound limit on the amount of cheese that can be issued to children and women?
- ___ a) Cheese is more expensive than milk.
___ b) Participants generally don't like cheese as well.
30. Cheese may be substituted at the rate of ____ pound(s) of cheese per ____ quarts of milk.



ANSWERS

23. True
24. 3
25. True
26. False, milk must be purchased in the sized containers listed on the check which may include gallon, half gallons, and quarts.
27. Any 2 of the following: 1) in cooking (custards, soups, etc.), 2) in "milk shakes," 3) to extend the fresh milk supply, 4) to make yogurt.
28. False, they are not authorized because they are more expensive than milk, are not fortified with vitamin D, and because cottage cheese is not high enough in calcium.
29. a
30. 1 pound of cheese per 3 quarts of milk

Juices Available on WIC for Women and Children:



- | | |
|------------|-------------------|
| orange | pineapple |
| grapefruit | orange-grapefruit |
| apple | orange-pineapple |
| grape | tomato |
| | V-8 |

Unauthorized Foods:

Refer to Appendix II for a list of foods not allowed on the Colorado WIC Program.



JUICE

Why are only certain juices allowed on the WIC Program?

- Juices allowed on the WIC Program must meet these guidelines:
- 1) be 100% real juice
 - 2) supply vitamin C (at least 30 mg per 100 ml or about 60% of the USRDA per 4 oz serving)

Juice may be issued in either 12 ounce cans of frozen concentrate or in 46 ounce cans of single strength juice.

Citrus juices, such as orange or grapefruit are naturally high in vitamin C and are allowable WIC juices. Seneca, Old Orchard, and Tree Top apple juice and Seneca, Old Orchard, and Welch's grape juice have vitamin C added so they are allowable. Other brands of grape or apple juice, without added vitamin C do not meet the minimum vitamin C level and are not authorized for WIC. Drinks such as Tang or Hi-C, even though they contain vitamin C, are not authorized on WIC since they are not 100% real juice.

Can more than one kind of juice be purchased at a time?

Yes, a variety of juices may be purchased as long as the total amount purchased does not exceed the amount listed on the check.

CEREAL

Why are only certain brands of cereal allowed on the WIC Program?

Cereals on the WIC Program are all:

- ✓ low in sugar. They contain no more than 6 gm of sugar per ounce.
- ✓ high in iron. They must supply at least 28 mg of iron per 100 grams of dry cereal.

High-iron, low-sugar cereals such as those allowed in WIC are important for young children because:

1. Their iron need is high due to their rapid growth rate. Iron-deficiency is the most common nutrient deficiency among young children. A good iron source in the diet, such as cereal, can help to prevent iron-deficiency anemia. The consequences of anemia may include impaired growth, development, behavior, and intellect. Since the consequences may persist even after the anemia is resolved, it is very important to prevent it. Regular use of high-iron cereals by young children can help to ensure a diet adequate in iron.

2. High levels of sugar in the diet can increase the risk of dental cavities and contribute to an inadequate diet since sugar represents "empty" calories (it provides calories, but no nutrients). It is particularly important that children not eat a lot of sugar. Their nutrient need relative to their calorie need is quite high. The amount of empty calories should be limited.
3. Issuing high-sugar cereals would not be teaching sound eating habits to our participants and would not represent the best use of WIC funds to supply nutrients.

Can infant cereal be purchased with adult checks?

Yes, there may be occasions when a caregiver will want to provide infant cereal to a child.

Quiz Time!

Here are labels from two boxes of cereal. Which box is most likely a WIC-approved cereal?

A

B

Nutrition Facts		
Serving Size 1½ cups (30g)		
Servings Per Container about 8		
Amount Per Serving	Kcal	with ½ cup skim milk
Calories	120	160
Calories from Fat	5	10
% Daily Value**		
Total Fat 0.5g	1%	1%
Saturated Fat 0g	0%	0%
Cholesterol 0mg	0%	1%
Sodium 270mg	11%	14%
Potassium 45mg	1%	7%
Total Carbohydrate 26g	9%	11%
Dietary Fiber 1g	3%	3%
Sugars 3g		
Other Carbohydrate 22g		
Protein 2g		
Vitamin A	10%	15%
Vitamin C	10%	10%
Calcium	4%	15%
Iron	45%	45%
Vitamin D	10%	25%
Thiamin	25%	30%
Riboflavin	25%	35%
Niacin	25%	25%
Vitamin B ₆	25%	25%
Folic Acid	25%	25%
Vitamin B ₁₂	25%	35%
Zinc	25%	30%

Nutrition Facts		
Serving Size 1 cup (55g)		
Servings Per Container About 8		
Amount Per Serving	Kcal	with ½ cup skim milk
Calories	200	240
Calories from Fat	25	25
% Daily Value**		
Total Fat 3g	4%	4%
Saturated Fat 0g	0%	3%
Polyunsaturated Fat 1g		
Monounsaturated Fat 1g		
Cholesterol 0mg	0%	1%
Sodium 320mg	13%	16%
Potassium 150mg	4%	10%
Total Carbohydrate 43g	14%	16%
Dietary Fiber 3g	12%	12%
Sugars 14g		
Other Carbohydrate 26g		
Protein 4g		
Vitamin A	10%	15%
Vitamin C	0%	0%
Calcium	25%	40%
Iron	25%	25%
Vitamin D	10%	25%
Thiamin	25%	30%
Riboflavin	25%	35%
Niacin	25%	25%
Vitamin B ₆	25%	25%
Folic Acid	25%	25%
Vitamin B ₁₂	25%	35%
Phosphorus	10%	20%
Magnesium	8%	10%
Zinc	25%	30%
Copper	4%	4%

Answer: A. It has less than 6 grams of sugar per ounce.
(1 oz = approximately 28 grams)

**Self
Check**



QUESTIONS

31. Only certain juices are allowed on the WIC Program because:
(check all that apply)

- a) They are low in added sugar
- b) They supply vitamin C (at least 30 mg/100 ml)
- c) They are the least expensive
- d) They are 100% real juice

32. Only certain types of cereal are allowed on the WIC Program
because: (check all that apply)

- a) They are high in sugar
- b) They are high in iron
- c) They are the least expensive
- d) They are low in sugar
- e) They are high in all major vitamins and minerals



ANSWERS

31. b,d

32. b,d



CEREALS (cont.)

Can a participant choose more than one kind of WIC cereal at a time?



Yes, a variety of cereals may be purchased. It is important that the total amount of the cereal purchased not exceed the amount listed on the check.

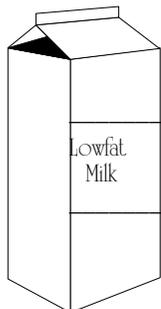
Why is cereal limited to 28 ounces until age 2?

In the past 36 ounces of cereal were issued per month to all children. However, many WIC caregivers reported that their children simply could not eat this much. This led to wastage which benefitted neither the participants nor the WIC Program. So the limit was decreased to 28 ounces for the 12 to 24 month old child. After 2 years of age, the cereal allotment is increased to 36 ounces.

LOWFAT FOOD PACKAGES

What are Lowfat Food Packages?

Lowfat food packages are slight modifications of standard food packages. The amounts of nutrients supplied are similar, but the calorie and fat levels are lower. It is recommended that lowfat food packages should be issued to overweight children over two years of age. The ways in which a lowfat food package differs from the standard child food package are:



1. Lowfat milk must be purchased (1%, buttermilk, or skim).
2. Only 1 pound of cheese can be purchased. (Two pounds of reduced fat cheese may be offered.) Use of reduced fat cheeses is encouraged.
3. Beans instead of peanut butter are issued.

Why is a Lowfat Food Package highly recommended for overweight children?

There are several reasons:

1. There is no easy answer to weight control. Dietary changes based on modification of the food package may be only one part of a successful weight control scheme. Nutrition



Comparisons of Nutrient Content of WIC Cheeses:

1 oz serving	Calories	Sodium mg	Fat gm
American	90	360	9
Brick	110	170	9
Cheddar	110	180	9
Colby	110	180	9
Jack	110	180	9
Longhorn	110	169	9
Mozzarella (part skim)	80	130	5
Muenster	110	180	9
Provolone	100	260	7
Reduced fat (varies by kind)	80-90	55-210	5-6
Swiss	107	74	8

The two regular WIC cheeses lowest in calories are mozzarella and provolone. However, the differences in calorie content among the various cheeses is not great. All cheeses are relatively high in calories and fat.

counseling should also incorporate discussion on modifying the entire diet, eating behaviors, and improving activity patterns.

The WIC foods can be modified to reinforce your nutrition education messages and to contribute to the establishment of sound eating practices that will help in life-long weight control. Introduction of lowfat milk (after 2 years of age) is one such modification. Most young children can be successfully introduced to 2% milk, which does not differ greatly in taste from whole milk, and then transitioned to 1% milk. The transition to skim milk may be made for children when the family expresses a willingness to try it.

2. You might be wondering why cheese may be issued to overweight children since it is high in calories and fat. It is because cheese is also a very nutritious food. It makes good snacks and can be used to replace the junk ("empty" calorie) food snacks that may be in the diet of overweight children. So it would not be wise to eliminate cheese from the food package entirely, but rather to:
 - a. limit the amount of cheese that may be issued to one pound per month and encourage Kraft reduced-fat cheeses. Encourage cheeses that are lower in fat such as part skim mozzarella or provolone. There are also lowfat varieties of many cheeses such as cheddar.
 - b. educate parents that cheese, though nutritious, is high in calories and should be used sparingly in the diets of overweight children.
3. WIC is a preventative health program. WIC staff should help participants and caregivers identify areas in the family's food choices, eating behaviors, and lifestyles that will benefit the WIC participants. Choosing a lowfat food package may encourage the family to try healthy foods that can benefit the participant for the rest of their life.

How are lowfat food packages identified?

Lowfat food packages for children (ages 2-5) begin with the letters CL. Since lowfat milk is not recommended for children under age two, there are no lowfat food packages for toddlers (children under age two).

Self
Check



weight control



QUESTIONS

33. True or false? The cereal allotment for the 1-2 year old is limited to 28 oz. per month since most children this age would not typically eat more than this.
34. True or false? The cereal allotment for a 2-5 year old is 36 oz.
35. Why is it recommended that overweight children over the age of 2 receive a lowfat food package? Check all the correct answers that apply.
- a) it can be used to reinforce nutrition messages around
 - b) it may help to establish life-long eating habits that will help to prevent overweight
 - c) it will help the child to lose weight
36. Which of the following are true about lowfat food packages?
- a) only skim milk may be used
 - b) none of them contain cheese
 - c) beans, rather than peanut butter are issued
 - d) only lowfat milks (1%, skim, or buttermilk) may be purchased
 - e) cheese is limited to 1 pound (or 2 pounds of reduced fat cheese)



ANSWERS

33. true
34. true
35. a,b
36. c,d,e

We have covered a lot of information on the Child Food Packages. It will help to study the chart on the next page which summarizes the components of the child food packages and lists the corresponding nutrition principles.

Summary of the Child Food Package Components

FOOD PACKAGE	NUTRITION PRINCIPLE
1. The food package contains milk, cheese, eggs, cereals, juice, and and beans or peanut butter.	1. These foods are high in protein, iron, calcium, vitamin A, vitamin C; they represent servings from each of the major food groups and can be used to supplement a well-balanced diet.
2. 21 quarts per month is the milk allotment.	2. This amount is adequate to meet nutrient needs, especially calcium, without supplying an excess amount which may spoil the appetite for other foods.
3. 2 pounds is the standard issuance of cheese.	3. Limits the use of this relatively expensive food item but still allows variety in the food package.
4. Lowfat milks are not allowed until 2 years of age.	4. Lowfat milks are too low in fat and calorie for the young child.
5. Cereals on the WIC Program are limited to those high in iron and low in sugar.	5. The iron requirement for young children is very high and iron-deficiency anemia is a common and significant problem; low sugar foods reinforce principles of good nutrition and dental health.
6. Cereal limit is 28 ounces for the 1-2 year old.	6. Supplies enough cereal to help meet iron needs without supplying an excess amount that may just go to waste.
7. A lowfat food package is recommended for overweight children.	7. Lowfat food packages provide similar amounts of nutrients but less fat and calories; help to reinforce nutrition education and teach sound eating habits.
8. Juices on the WIC Program are limited to those high in vitamin C and with no sugar added.	8. Foods without added sugar reinforce principles of good nutrition and dental health; juices which are highest in vitamin C can best help meet the daily nutrient needs.

**Self
Check**



QUESTIONS

37. Without looking back at the chart on the previous page, see if you can match the description of the child food package on the right with the corresponding nutrition principle on the left:

- | | |
|-----------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| __ 1. The food package contains milk, cheese, eggs, cereal, juice, and beans or peanut butter. | A. The iron requirement for young children is very high and iron-deficiency anemia is a common and significant problem; low-sugar foods reinforce principles of good nutrition and dental health. |
| __ 2. 21 quarts per month is the milk allotment. | B. These foods are high in protein, iron, calcium, vitamin A and C; they represent servings from each of the major food groups and can be used to supplement a well-balanced diet. |
| __ 3. 2 pounds is the standard issuance of cheese. | C. These food packages provide similar amounts of nutrients but less fat and calories; help to reinforce nutrition education and teach sound eating habits. |
| __ 4. Nonfat milk is not allowed until 2 years of age. | D. This amount is adequate to meet nutrient needs particularly for calcium without supplying an excess amount which may spoil the appetite for other foods. |
| __ 5. Cereals on the WIC Program are limited to those high in iron and low in sugar. | E. Nonfat milk is too low in fat and calories for the young child. |
| __ 6. Cereal limit is 28 ounces for the 1-2 year old. | F. Limits the use of this relatively expensive food item by low income families but still allows variety in the food package. |
| __ 7. A lowfat food package is recommended for overweight children. | G. Food without added sugar re-enforce principles of good nutrition and dental health; juices which are highest in vitamin C can best help to meet the daily nutrient needs. |
| __ 8. Juices in the WIC Program are limited to those which are high in vitamin C and with no sugar added. | H. Supplies enough cereal to help meet iron needs without supplying an excess amount that may just go to waste. |



ANSWERS

37.

1. B
2. D
3. F
4. E
5. A
6. H
7. C
8. G

Great! You have just finished the Child Food Package Section. Next we will look at the food packages for women.



IV. WOMEN'S FOOD PACKAGES

The allowable foods for pregnant, breastfeeding, and postpartum women on the Colorado WIC Program and the monthly maximum amounts are summarized below:

	Adult Juice	Fresh* Milk	Cheese	Eggs	Peanut butter/ beans	Adult Cereal	Carrots	Tuna
Pregnant/ Breast- feeding Women	6 12-oz. cans frozen conc. -or- 46 oz. cans single strength	28 qts.		2 doz.	18 oz. jar peanut butter -or- 1# beans	36 oz.	None	None
Exclusively Breastfeed- ing Women	7 12-oz. cans frozen conc. -or- 46 oz. cans single strength	28 qts.	1 lb.	2 doz.	18 oz. jar peanut butter -and- 1 lb. beans	36 oz.	2 lbs.	26 oz. canned water- packed
Postpartum Women	4 12-oz. cans frozen conc. -or- 46 oz. cans single strength	24 qts.		2 doz.	None	36 oz.	None	None

* Cheese, powdered milk, or canned milk may be substituted for fresh milk at the rate of:

1 lb of cheese	3 quarts of milk
1 qt of powdered milk	1 quart of milk
1 12-oz can evaporated milk	1 quart of milk

Several tailored food packages are available containing powdered and/or evaporated milk with or without fresh milk.

Overweight Women Lowfat food packages are recommended for overweight pregnant, breastfeeding and post-partum women. The ways in which the lowfat food packages for women differ from the standard women food package are:

1. Lowfat milk must be purchased (1%, buttermilk, or skim).
2. Only 1 pound of cheese can be purchased. (Two pounds of reduced fat cheese may be offered.) Reduced fat and lower fat cheeses such as mozzarella and provolone should be encouraged.
3. Beans instead of peanut butter are issued. NOTE: Postpartum women's food packages do not contain beans or peanut butter.



Note: The foods in the child's and women's food packages are similar. Information already covered for children (such as why only certain brands of cereal or juice are allowed) will not be repeated here. Only new information that pertains specifically to women is presented in this section.

Why are these particular foods provided in the WIC food package for women?

The reasoning behind supplying these foods to women is similar to that described for children. To summarize:

1. Pregnancy, lactation, and the postpartum period all represent periods of increased nutrient needs. Nutrient deficiencies at these times, particularly pregnancy, can have serious consequences for mother and baby.
2. The foods in the WIC food package are all very nutritious. They are high in nutrients for which pregnant/breastfeeding/postpartum women have a particularly great need. These nutrients include protein, vitamin A, vitamin C, folate, calcium, and iron.
3. The WIC foods represent choices from each of the major food groups and help to supplement a well-balanced diet.

Why does WIC offer extra foods for exclusively breastfeeding women?

WIC strongly encourages women to breastfeed, and believes that by offering some extra foods, women are encouraged to breastfeed. Secondly, some women feel that by getting supplemental formula, they're getting "something extra" from WIC. The additional juice, cheese, beans, carrots and tuna offers breastfeeding women who are not supplementing "something extra" in the form of extra foods.

Exclusively Breastfeeding:

"Exclusive" means a breastfeeding woman whose infant is not receiving any supplemental formula (either samples or checks) from WIC.



If a woman has twins and is breastfeeding one baby exclusively and the other partially, what food package should she receive?

She should receive an exclusively breastfeeding package because at least one baby is exclusively breastfed.

Why were tuna and carrots chosen as "extra" foods in the enhanced breastfeeding food package?

After an extensive national review, these foods were chosen because they're widely available, even in rural areas, most people like them, and the extra nutrients (such as protein in tuna and vitamin A in carrots) they supply can provide a better diet for the mom, which can improve the quality of breast milk for the baby.

If a woman is partially breastfeeding do we consider her a breastfeeding mother?

Yes a woman is considered a breastfeeding mother if she is nursing at least an average of one time per day. She would be entitled to receive a food package for a pregnant and partially breastfeeding woman.

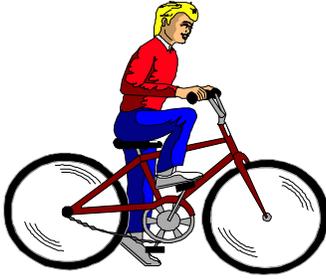
Why do postpartum women receive less food than breastfeeding and pregnant women?

In general, the nutrient needs of the postpartum woman are not as great as those of a woman who is pregnant or breastfeeding. To reflect this, the food packages are adjusted to provide somewhat less food:

1. 24 quarts of milk instead of 28 quarts
2. 4 12 oz. cans frozen juice (or equivalent) instead of 6 cans
3. No beans or peanut butter

Why are lowfat food packages recommended for overweight women?

The reasons behind prescribing a lowfat food package for overweight women are similar to those for overweight children. To summarize:



Self
Check



1. Modifying WIC food packages to decrease the calorie and fat content can be one part of a successful weight control plan. These modifications can be used to reinforce nutrition counseling and to contribute to the establishment of sound eating practices that will help in life-long weight control.
2. Most participants will accept 2% milk which does not differ greatly in taste from whole milk. 1% and skim milk may be introduced as women express a willingness to try it.
3. It is better for the preventive health care of the overweight participant to alter the food package to enable them to try an intervention to control their weight.

QUESTIONS

38. The foods provided in the WIC food packages for women were chosen because: (check all that apply)
- a) They are high in nutrients that are especially important for pregnant, breastfeeding, and postpartum women, including protein, iron, vitamin A, vitamin C, folate, and calcium.
 - b) They are very nutritious foods.
 - c) They help to ensure an adequate intake of foods from each of the major food groups.
 - d) They are high in nutrients which have been shown to be lacking in the diets of low income families.
39. True or false? Lowfat food packages are required for overweight postpartum women.
40. In what ways are the WIC foods for postpartum women different from the WIC foods for pregnant/ breastfeeding women: (check all that apply)
- a) Postpartum women receive beans, but no peanut butter
 - b) Postpartum women receive less milk
 - c) Postpartum women receive no juice
 - d) Postpartum women receive less juice
 - e) Postpartum women receive no beans or peanut butter
41. True or false? Postpartum women receive less food than pregnant/ breastfeeding women because, in general, the postpartum woman's nutrient needs are lower.



42. In what ways are the food packages for exclusively breastfeeding women different than the ones for pregnant/breastfeeding women?
(check all that apply)

- a) Exclusively breastfeeding women receive extra juice
- b) Exclusively breastfeeding women receive an extra pound of cheese
- c) Exclusively breastfeeding women receive both beans and peanut butter
- d) Exclusively breastfeeding women receive tuna and carrots



ANSWERS

- 38. All answers are correct; a,b,c,d
- 39. False
- 40. b,d,e
- 41. True
- 42. All answers are correct; a,b,c,d

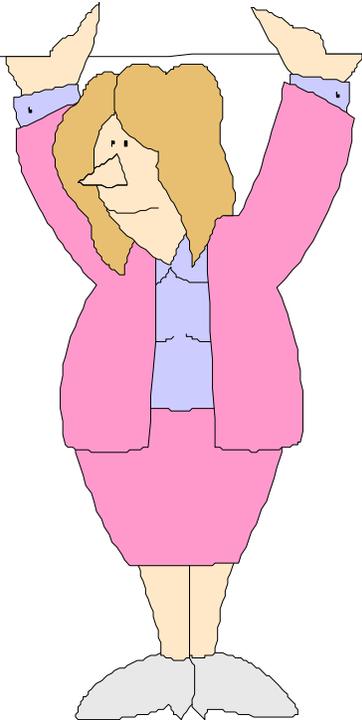
The components of the WIC food packages for women and the underlying nutrition principles just discussed are summarized below. Take a few minutes to review the chart.

SUMMARY OF THE WIC FOOD PACKAGE FOR WOMEN

FOOD PACKAGE	NUTRITION PRINCIPLE
1. Lowfat food packages are recommended for overweight postpartum women.	1. These food packages provides similar amounts of nutrients but less fat and calories; it helps to reinforce counseling and teach sound eating habits.
2. Postpartum women receive less food than pregnant/breastfeeding women.	2. In general, the nutrient needs of postpartum women are less than for pregnant/breastfeeding women.
3. Exclusively breastfeeding women (women who don't supplement with formula) receive carrots and tuna.	3. Carrots and tuna provide exclusively breastfeeding women with extra nutrients to enhance their diets.

You have completed the section on Women's Food Packages.

Just 3 more sections to go!



V. "SPECIAL" AND METABOLIC FOOD PACKAGES

The allowable foods in the "special" food packages for women and children with special dietary needs and the monthly maximum amounts are summarized below:

	Formula	Adult Cereal	Adult Juice	Fresh Milk	Eggs	Peanut butter or beans
Special Dietary Needs	35 13-oz. cans concentrate -or- 9 16-oz. cans pwd -or- 28 32-oz. cans RTF (or equiv)	36 ounce	3 - 12 oz. frozen cans -or- 3 - 46 oz. cans single strength	None	None	None

The allowable foods in the metabolic food packages and monthly maximum amounts are summarized below:

	Formula	Adult Cereal	Adult Juice	Infant Cereal	Infant Juice
Women & Children	9 16-oz. cans pwd -or- equiv	36 ounces	3 12-oz. cans frozen conc -or- 3 46-oz. cans single strength		
Infants 0-4 months	8 16-oz. cans pwd -or- equiv			2 8-oz. boxes	
Infants 4-6 months	8 16-oz. cans pwd -or- equiv			2 8-oz. boxes	2 32-oz. containers
Infants 6-12 months	8 16-oz. cans pwd -or- equiv			2 8-oz. boxes	2 32-oz. containers

Special Formulas and Nutrition Products:
Selected by a physician for specific medical conditions, allergies, and intolerances and approved by the WIC RD/RN.

Issuance of Special and Metabolic food packages always requires a written authorization from a physician for the formula and approval by the WIC RD/RN.

Special Food Package Numbering

The Special food packages are numbered according to a logic system. Each food package contains 5 digits. The first digit (S) identifies the food package as "special". The second digit, A, B, or C, refers to whether or not juice and cereal are added, or if the package does not contain formula. The last three numbers refer to the specific formula, and generally correspond to a full infant formula package. For example, SA100 is a special food package containing the full allotment (9 16-oz cans) of powdered Enfamil; IN100 is an infant food package containing the full allotment (8 16-oz cans) of powdered Enfamil for infants under 4 months. The food package numbering system for special food packages is summarized below:

"Special" Food Package Numbering System*

Special formula Only	Special formula + cereal and juice	Cereal + Juice Only
SA	SB	SC

* first two digits of food package number

Metabolic Food Packages Numbering

The metabolic food packages are numbered according to a logic system. Each food package contains 5 digits. The first digit refers to the type of food package (Metabolic); the second digit indicates whether or not cereal and juice are included. The numbering system is summarized in the chart below:

Metabolic Food Package Numbering System*

	Formula only	Formula + cereal	Formula + cereal & juice
Women & Children	MA		MB
Infants 0-4 months	MI		
Infants 4-6 months		MJ**	
Infants 6-12 months			MK***
Infants 6-12 months (with 3 boxes cereal)			ML***

* first two digits of food package number

** infant cereal only

*** infant juice only

What distinguishes "special" food packages from standard food packages for children and women?

On the WIC Program, formula is normally issued only to infants. When they turn one year old they are switched to a food package containing whole milk. If a child after 1 year of age (or an adult) must continue to use formula rather than milk, they must be issued a "special" food package. These food packages provide formula, juice, and cereal only. Milk, cheese, eggs, beans or peanut butter are not issued.

Why would a child or an adult need to use formula rather than milk?

A number of metabolic or medical conditions affect nutritional needs and/or the ability to eat/digest milk and other foods. For example, a child who has a serious physical handicap may not be able to handle solids well. This child may need to use a special formula past one year of age to assist in obtaining adequate nutrients and calories. Children who require formula should be followed by a physician to continually reevaluate the need for formula.

Inborn Errors of Metabolism:

Errors in an individual's genetic make-up that can have serious consequences to the body. Examples include Phenylketonuria and galactosemia.



What is the procedure for issuing "special" or metabolic food packages?

A doctor's written authorization must be obtained and kept in the participant's chart in order to issue a special or metabolic formula. When metabolic formula requests are received, the clinic nutritionist or nurse needs to contact their State nutrition consultant as soon as possible to request the appropriate food package. Metabolic food packages are created on an "as needed" basis. If the appropriate food package is not available on the system, it may take 3-5 days to have it created and downloaded to the clinic. If possible, the nutritionist or nurse should contact the State Office as soon as the participant makes a WIC appointment, so that the appropriate food package is ready when the participant comes in for his/her appointment.

Low-calorie formulas may not be authorized and issued solely for the purpose of enhancing nutrient intake or managing body weight of participants. (Federal Regulation)

This means that the formula may not be issued to a postpartum woman solely because she wants to use it to lose weight. A formula can only be given if there is a medical reason, such as PKU, for the use of the formula. In the same vein, this means that an infant may not be placed on a low-calorie formula (a formula with less than 20 calories per ounce) to lose weight.

When can special or metabolic formulas be issued?

Reasons for using formulas and special medical-nutritional products include, but are not limited to, metabolic disorders, gastrointestinal disorders, malabsorption syndromes, and allergies.

Procedures for Special Formula/Product Requests.

Physician's Role 

Prescription information must contain:

What information must the prescription contain?

1. Name of the product.
2. The reason (diagnosis or symptoms) why the child needs the formula.
3. Instructions for preparation if the formula/product is different than the standard preparation. The standard preparation for infant formula is 20 calories per fluid ounce.

Instructions for preparation and administration to the parents are the responsibility of the physician. WIC can coordinate follow up and education as needed.

4. Length of time the product is to be used, e.g., one month before reevaluation of need and tolerance.

Nutritionist's or Nurse's Role 

What procedure is recommended for the WIC local agency to follow when a request for a prescribed formula/product is received?

1. The prescribing physician selects the formula/product from a list of allowable WIC foods, educates the participant/family on its use, and monitors tolerance and continued need.
2. He/she completes the Physician Authorization Form or a prescription, and includes the name of the product, diagnosis, length of time needed, and provides special instructions for preparation and use if not standard. The doctor should also send the WIC Program a written statement of any verbal changes in the prescription. It is helpful if the physician can provide the participant with a starter supply of the formula/product (if needed immediately) to allow the WIC clinic to schedule an appointment for the participant and to arrange stocking with the retailer.

The WIC nutritionist or nurse works in partnership with the physician to provide a formula/product that meets the participant's needs. These activities are the responsibility of the WIC nutritionist/public health nurse and may never be delegated to paraprofessional staff.

The WIC nutritionist or nurse:

1. Contacts the physician when more information is needed or when the product is not available and makes recommendations as appropriate.
2. Reviews the prescription for completeness and appropriateness for the participant's needs using the Formula and Medical-Nutritional Product Guide for the Colorado WIC Program as a reference.
3. Determines the length of time the product will be issued without a new prescription. The time limit should not exceed the limit in this guide.
4. Completes and signs the Physician Authorization Form and places a copy in the participant's chart or places the prescription in the chart.
5. Completes the WIC education record for the participant to assure appropriate follow up and education.

Educator's role



6. Reinforces the physician's recommendations for use of the formula and educates on purchasing the formula with WIC checks.
7. When the prescribed product is not available through the WIC Program, contacts a State WIC nutrition consultant to determine if approval can be given.
8. Contacts a State WIC nutrition consultant when nutrition information about the product.

The following are the responsibilities of the WIC educator:

1. Contacts the WIC retailer to arrange for the product to be stocked, gives timelines for expected use, and determines when it will be available, referring to the Formula and Medical-Nutritional Product Guide for the Colorado WIC Program as needed.
2. Assigns the correct food package and prints the participant's checks.
3. Completes growth and hematocrit measurements at certification and recertification following the guidelines for all participants.

Who in the WIC clinic is responsible for evaluating and authorizing issuance of the product?

The WIC nutritionist or public health nurse is responsible. The authorization or refusal to authorize the product should be documented in the participant's WIC chart by the WIC nutritionist or public health nurse.

Appropriateness of Formula:

Consider

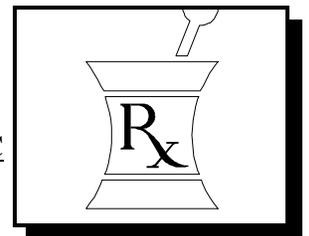
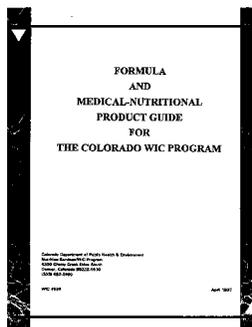
- Availability
- Appropriateness
- Time Period
- Intended Use
- Safety

What criteria should the WIC nutritionist or nurse use to evaluate the appropriateness of the prescribed formula?

1. **AVAILABILITY:** If the formula is authorized for use by WIC, arrange with the retailer and, if needed, the formula company representative to obtain it. The representative may be able to provide a small supply of formula until the retailer gets stock. Almost all participants who are discharged by or were treated by a hospital will be given a starter supply of formula.
2. **APPROPRIATENESS:** Evaluate the appropriateness of the formula for the participant's age, development, symptoms, and diagnosis. For assistance, refer to the Formula and Medical-Nutritional Product Guide for the Colorado WIC Program or call your nutrition consultant.
3. **TIMELINES FOR USE:** Does it seem reasonable, in light of the child's status, to use the product for the prescribed time period? Is there a reasonable likelihood the child will return to the MD for appropriate follow up? Will safety and tolerance be concerns if the product is issued?
4. **INTENDED USE:** What is the intended use? Formulas to manage weight and to be used for tube or supplemental feedings are not allowed by Federal Regulation.
5. **SAFETY:** Is there assurance the family can offer the formula safely? Can the MD provide the ongoing needed follow up? Formula exceeding 24 calories per ounce is usually not recommended for use in public health/at home without close supervision. If the formula requires the addition of carbohydrate, such as RCF formula, can it be prepared correctly? While formula issuance should not be refused due to safety concerns, concerns should be discussed with and referred to the physician.

For a complete discussion of all infant formulas—contract, non-contract, special and metabolic, please see the Formula and Medical-Nutritional Products Guide for the Colorado WIC Program.

Please note that an RD or RN needs to approve all issuance of special formulas and a doctor's prescription is needed to issue non-contract and special formulas.



Self
Check



QUESTIONS

43. True or false? "Special" food packages are for infants, children, or women who need a special medical formula.
44. "Special" food packages contain which of the following?
- a) formula, cereal, and eggs
 - b) formula, milk, juice, and eggs
 - c) formula, cereal, and juice
 - d) formula or milk, cereal, and juice
45. True or false? Issuing a formula to a child requires a physician's order only if it is a metabolic formula.



ANSWERS

43. False, "special" food packages are for children and women only who need any formula not just the special formulas.
44. C
45. False, a physician's order is always required to issue formula to a child.
-
-

VI. FOOD PACKAGE TAILORING



What is food package tailoring?

Food package tailoring means selecting a specific WIC food package to meet the special needs and preferences of participants. The food packages as described in the previous sections are already highly tailored according to Federal and State guidelines. That is, the types (e.g., dried beans vs. peanut butter); the forms (e.g., dry vs. fresh); and quantities of foods provided to WIC participants; are tailored generally to meet the needs of participant groups, (e.g., pregnant women, children aged 1-2, etc.). These Federal and State guidelines are general rules for developing food packages. They are based on nutrition principles that apply in a broad sense to certain types of participants.

An equally important part of food package tailoring is **individual tailoring**. Individual food package tailoring involves development of a unique food prescription based on individual factors about a participant that are not covered by the broad Federal and State guidelines. This approach helps ensure that the types and amounts of WIC foods issued are the best suited to the needs, preferences, and home environment of the participant.

Advantages to food package tailoring include the following:

- reinforces nutrition education and counseling provided to participants;
- helps to best meet the specific nutrition needs of participants (e.g., lowfat milk for overweight children) and may better contribute to alleviating the participants' specific nutrition risk factors;
- prevents food waste and represents a responsible use of WIC funds.

What are the factors that should be considered when individually tailoring a participant's food package?

Factors that should be considered in individual food package tailoring include the following:

- 1) home storage facilities (e.g., providing powdered milk if no refrigeration is available)
- 2) nutrition risk factors (e.g., recommending a lowfat food package for an overweight 3 year old)
- 3) food allergies (e.g., omitting eggs due to allergy)
- 4) lactose intolerance (e.g., providing lactose-reduced milk)
- 5) food preparation abilities (e.g., issuing ready-to-feed formula rather than powdered)
- 6) participant preference (e.g., cultural preferences for beans rather than peanut butter)
- 7) dietary intake (e.g., giving one box of cereal to an infant just beginning to eat solids)

More details of some of these situations will follow.

How do state and federal guidelines for allotments of milk and cereal to children differ?

The maximum limits on the foods are defined by a combination of federal regulations and state tailoring guidelines. In some instances, the state guideline sets a lower maximum than the federal regulation.

MONTHLY MAXIMUM FOR WIC FOODS

<u>Children</u>	<u>State Tailoring Guideline</u>	<u>Federal Regulation</u>
Milk (1-5 years)	21 quarts	24 quarts
Cereal (1 year old)	28 ounces	36 ounces
Cheese	3 pounds	4 pounds

Can the Federal Maximums be used when issuing foods to participants?

For the majority of participants, the state guidelines should be followed since lower maximums were established to avoid food wastage and to be consistent with dietary recommendations. However, on an individual basis, a participant may have special needs which would warrant issuing up to the full federal maximum. At the local agency's discretion, the state tailoring maximum may be exceeded. A valid reason should be documented on the participant's care plan. The federal maximums may not be exceeded under any

circumstances.

Can more than 4 pounds of cheese ever be issued?

A participant who is diagnosed as lactose intolerant may receive up to the equivalent of their fresh milk allotment as cheese. These amounts are: 7 pounds for children, 8 pounds for postpartum women, 9 pounds for pregnant or breastfeeding women, and 10 pounds for exclusively breastfeeding women. It is very unlikely that the maximum amount of cheese would ever be issued. It is more likely that the food package for lactose-reduced milk would be issued. Tailored food packages containing varied amounts of milk or lactose-reduced milk and cheese are available.

Can WIC serve homeless individuals?

Yes, WIC wants to make it possible for eligible homeless individuals to receive benefits. A homeless person may not be excluded from receiving WIC benefits due to an inability to provide proof of residence or financial eligibility. Refer to the *Colorado WIC Procedure Manual* for information regarding Program eligibility for a homeless individual.

The guidelines for issuing homeless food packages follows.

A homeless individual is:

A woman, infant, or child who lacks a fixed and regular nighttime residence, or whose primary nighttime residence is: a publicly supervised or privately operated shelter including a welfare hotel, a congregate shelter, or a shelter for victims of domestic violence, designated to provide temporary living accommodations; an institution that provides a temporary residence for individuals intended to be institutionalized; a temporary accommodation in the residence of another individual not exceeding 365 days; or a public or private place not designed for, or ordinarily used as, a regular sleeping accommodation for human beings.

HOMELESS FOOD PACKAGE GUIDELINES

Facilities	Formula	Milk	Cheese	Juice	Cereal	Eggs	Beans/ Peanut Butter	Tuna	Carrots
Refrigeration, dry storage, and cooking	Powder or liquid conc., ready-to-feed	Fluid, powdered, or evaporated	Substitute-same as regular food pkg.	Canned, bottled, or frozen	Up to 36 oz.	2 dz.	1 lb. beans/ or 1 - 18 oz jar of peanut butter	Up to 26 oz.	2 lbs. canned or fresh
<u>NO</u> refrigeration and <u>NO</u> cooking facilities with dry storage	Powder or ready-to-feed 4 oz. bottles	Powdered or UHT	Up to 4 lbs. may be issued	Canned or bottled	Up to 36 oz.		2-18 oz. jars of peanut butter	Up to 26 oz.	2 lbs. canned

- ▶ Exclusively breastfeeding woman with no refrigeration should be encouraged to purchase 8 single serving (3¼ oz.) cans of tuna and 2 16-oz. cans of canned carrots.
- ▶ Breastfeeding should be encouraged as the easiest and safest way to feed the infant. Formula-fed infants should receive powdered formula, mixed one bottle at a time. Ready-to-feed formula may be issued according to Colorado WIC Food Package Tailoring Guidelines.
- ▶ If proper refrigeration is not available, food packages with eggs and fluid milk, including evapo-rated, may not be issued to the participant. Food packages containing powdered milk or UHT milk should be issued instead. The participant should be instructed to mix one glass of milk at a time. Nonfat dry milk should not be used for children between 12-24 months of age.
- ▶ A maximum of four pounds of cheese may be substituted for some of the dry milk. WIC cheeses are classified as hard cheeses and the acid used in processing retards spoilage. However, the rate of spoilage varies from days to a week depending on room temperature. Cheese wrapped in foil tends to spoil more slowly.
- ▶ Canned or bottled, not frozen, juices are included in the homeless packages. The taste and smell may be altered after the can is opened if it is not refrigerated. Encourage the participant to drink the juice as soon as possible.
- ▶ Food packages containing eggs may not be issued if refrigeration and cooking facilities are not available. A food package substituting one 18 ounce jar of peanut butter for the eggs may be issued.
- ▶ Homeless food packages contain up to six checks per month for each WIC participant.

What food considerations need to be made for a homeless individual?

If the person is residing in a shelter, the WIC foods must be kept separate from the general inventories. Food package tailoring guidelines should be used appropriately. The participant's living arrangements must be considered when assigning the food package. Information regarding storage, transportation, ability to access the grocery store, and use of specific food items should be obtained when certifying the participant.

Other information that should be covered with participants who reside in a homeless shelter include the following: (1) WIC benefits are for the participant only. (2) WIC foods cannot be used in communal feeding. (3) The facility cannot prevent WIC participants from receiving WIC foods and nutrition education. (4) Although it is permissible that a shelter staff member occasionally act as proxy for a WIC participant, proxies from a facility may not routinely pick up WIC checks.

Is it necessary to determine if a participant is homeless?

No, the local agency is not required to determine if each applicant is homeless. However, if during certification it becomes known that the individual resides in a shelter, the staff member must determine if it is a WIC-eligible shelter. The State Office will provide a list of participating homeless shelters to each local agency.

Persons staying at a homeless facility should be enrolled for one full certification period even if the shelter is not a WIC-eligible shelter prior to the date of certification. The agency should determine if the shelter is willing and able to be a WIC-eligible shelter prior to the participants recertification date. The participant should be made aware that she/he will not be able to receive WIC food benefits at the next certification period if the shelter is not willing to be a WIC-eligible shelter. Participants who continue to reside in a shelter which will not comply with the WIC eligibility conditions can be recertified, but will not be able to receive food package benefits with the exception of infant formula. The participant can still receive nutrition education and referral services. The participant should then be given the name of a WIC-eligible shelter in the vicinity to which she/he can relocate.

Are there any other differences in how homeless individuals are

served?

Yes, in order to facilitate a homeless individual staying on the WIC Program when s/he moves, a verification of certification (VOC) form should be issued at the first participant visit. The purpose of the VOC form should be thoroughly explained and it will be necessary that the participant bring the VOC form to each visit. It is important that the date of check issuance be noted on the VOC form each time checks are given.

Should homeless individuals be given three months of checks at a time?

The decision to provide monthly or tri-monthly checks will be determined by the local agency. The average stay in a homeless or battered woman's shelter is usually less than one month. It is recommended because of the limited amount of time the participant may stay in an area that a homeless individual be issued checks on a month-to-month basis. Factors to consider when determining check issuance include: length of time the individual plans to stay in the area, length of time it is possible to stay in the shelter, ability to store and safeguard checks, nutritional risk factors, and access to transportation.

What tailoring options can be offered to someone who has a small refrigerator?

Special consideration may be given to participants who have limited refrigeration or storage capacity, especially migrant or homeless individuals. Examples of food package tailoring include:

- a. food packages for powdered or canned milk may be issued instead of food packages containing fresh milk or cheese
- b. powdered infant formula may be issued instead of the liquid concentrate; powdered formula requires no refrigeration
- c. food packages for single strength adult juice instead of frozen juice, may be issued if freezer space is a problem or water is tainted

Staff also have the ability to issue homeless food packages or ones that contain more than the standard 2 FIs.

NUTRITION RISK FACTORS (other than overweight)

Participants' nutrition risk factors should be taken into account when assigning their food packages. In fact, this is the most clear cut link between the nutrition education you provide and the food packages. Dietary recommendations made to participants based on their NRFs should be reflected and reinforced by the WIC foods they receive.

Because there are so many risk factors and so many different combinations of risk factors seen among our participants, there are no blanket rules for the types and amounts of foods that should be issued. However, below are examples of alterations that may be considered. Many others may occur to you as you work with the individual participants.

A. Underweight

An underweight participant needs a high quality diet as well as additional calories. Examples of ways in which higher calorie foods can be included are:

- 1) Whole milk may be encouraged instead of lowfat milk
- 2) Cheese may be encouraged as a snack food
- 3) A food package with peanut butter, rather than beans, may be issued

Comparison of calorie, protein, fat, and iron content of peanut butter versus pinto beans:

	Calories (kcal)	Protein (gm)	Fat (gm)	Iron (mg)
¼ cup peanut butter	376	16	32	1.2
8 oz pinto beans*	235	14	.9	4.5

*Different versions of dry beans are very similar in nutrient content.

Source: Bowes & Church's *Food Values of Portions Commonly Used*, Sixteenth Edition 1994.

Peanut butter is similar in total protein content, but is higher in calories and lower in iron than dry beans and legumes. This is why you may want to encourage beans rather than peanut butter for over-weight or anemic participants.

Iron content of WIC cereals:

<u>CEREAL</u>	<u>% U.S. RDA IN 1 SERVING</u>
<u>Cold Cereals</u>	
Bran Flakes (Post)	45%
Cheerios (Regular & Multi-Grain Plus)	45%
Chex (Corn, Rice, & Wheat)	45%
Crispix	
Grape Nuts Flakes (No raisin)	45%
Kellogg's Complete Oat Bran Flakes	45%
Kellogg's Complete Wheat Bran Flakes	
Kellogg's Corn Flakes	45%
Kellogg's Just Right Crunchy Nugget	100%
Kellogg's Raisin Squares Mini-Wheats	45%
Kix (Regular only)	45%
Life (Regular only)	45%
Product 19	100%
Puffed Rice (Malt-O-Meal brand)	50%
Puffed Wheat (Malt-O-Meal brand)	50%
Quaker Oatmeal Squares	45%
Special K	45%
Total (Corn & Whole Grain)	100%
Wheaties	45%
<u>Hot Cereals</u>	
Cream of Wheat (Unflavored)	45%
Malt-O-Meal (Unflavored)	45%
Maypo Oatmeal (Maple flavored)	45%

*The cereals approved for the WIC Program often change. The specific brands listed here may differ slightly from ones currently available and the % USRDA in 1 serving may change.

Food allergy:

A specific reaction to food that involves the immune system. The body interprets certain foods as threats and responds by producing antibodies.

B. Anemia

Participants with iron-deficiency anemia should increase the iron content of their diet. Examples of ways in which iron rich foods can be maximized include:

- 1) WIC cereals highest in iron may be encouraged such as Total. Specific cereals are not listed on the front of the check, but the participant can be encouraged to select these at the store.
- 2) Food packages containing beans, rather than peanut butter may be assigned since most beans are higher in iron. (See side bar)
- 3) A nutrition education tip: encourage participants to have their WIC juices and cereal at the same meal, because the vitamin C in the juice will enhance the absorption of the iron in the cereal.

C. Dental or Chewing Problems

Participants with dental or chewing problems may not be able to handle foods of certain textures or consistencies. Consult with them on a regular basis to determine what foods they are able to eat. For example, if they have trouble chewing, you can suggest that they select a hot cereal, such as Cream of Wheat instead of the harder, crunchier cold cereals.

D. Inadequate weight gain

There are two important points about the diet for a pregnant woman. The diet should be: 1) of high quality and adequate in nutrients, and 2) provide sufficient calories to allow an adequate weight gain. The calorie content of the WIC foods can be manipulated up while keeping the nutrient content unchanged. For pregnant women who evidence an inadequate weight gain, the addition of calories can be accomplished in the following ways:

- 1) Encourage whole milk
- 2) Issue a food package with more cheese (use for snacks)
- 3) Issue a food package containing peanut butter rather than beans

E. FOOD ALLERGIES

Special consideration may be given to participants with allergies or intolerances to certain WIC foods. Tailored

food packages are available; these are listed as "Allergies" and have one or more food items removed from the food package. The items removed are listed in parenthesis after each food package. Examples of food package tailoring for participants with allergies or intolerances are:

- 1) if a participant is allergic to eggs, issue a food package without eggs.
- 2) if a participant is allergic to wheat, a non-wheat cereal such as puffed rice, Rice or Corn Chex may be encouraged.
- 3) if an infant is allergic to orange juice, educate the caregiver to purchase noncitrus juices.
- 4) if an infant is allergic to cow's milk formula, a food package for a soy-based formula or a special formula may be issued. A doctor's prescription is required for special formulas.
- 5) if a child is allergic to cow's milk and soy milk, a food package for a special formula may be issued with a doctor's prescription; the child would then receive a "Special" food package which includes formula, 36 oz of cereal, and three cans of juice only (no milk, cheese, beans, peanut butter, or eggs may be issued).

Remember that participants with food allergies should be seen by the WIC RD/RN.

F. LACTOSE INTOLERANCE

Lactose is the name for milk sugar (or the type of carbohydrate present in both human and cow's milk). Some people do not tolerate or digest lactose well because they do not have enough of the special enzyme (lactase) that is needed to digest and absorb lactose. More than two-thirds of non-white and 5 to 20 percent of white American adults have trouble digesting lactose. This is a problem that primarily affects adults and is not commonly found in young children. Individuals may experience symptoms such as gas, cramps, bloating, or diarrhea when they consume lactose-containing foods such as milk. Participants who exhibit a severe response to lactose should be referred to their doctor. A tailored food package may be assigned according to the degree of intolerance exhibited.

Individuals display varying degrees of lactose intolerance and many can consume up to a cup of milk at a time without experiencing unpleasant symptoms. Chocolate and whole milk are sometimes better tolerated than 2% or skim

Food intolerance:

A reaction to food that generally does not involve the body's immune system. Intolerance reactions are generally localized and transient.

Tips to recommend to the lactose-intolerant participant:

Other tips to recommend to participants who experience lactose intolerance are:

1. Use the milk provided by the WIC Program to make yogurt. Yogurt is a fermented milk product that is generally better tolerated than milk.
2. Use other fermented (or "cultured") dairy products such as hard cheeses like cheddar and Swiss.
3. Try using milk in cooking (pudding, soup, white sauce, hot cereal) since this is often better tolerated than drinking fresh milk.
4. Try drinking small amounts of milk (¼-½ cup) and gradually increase the quantity until a tolerance level is determined. In general, small amounts of milk taken frequently with meals are better tolerated than drinking a large amount at one sitting.
5. It is important for participants to receive the nutrients provided by dairy products especially protein, calcium, and riboflavin (a B vitamin). Help participants who are intolerant to milk find alternative ways of consuming dairy products.

milk because of the fat content. Using milk in smaller amounts in recipes or with meals can reduce the likelihood and/or severity of symptoms.

Lactose-reduced milks such as Lactaid and Dairy Ease have been processed to reduce the amount of lactose available and can be well tolerated by lactose intolerant individuals. Lactose-reduced milks are allowable milks and are included on the allowable foods list. WIC checks that specify "any WIC-approved milk" may be used to purchase **up to one half-gallon** of lactose-reduced milk. Since Lactaid and Dairy Ease are available only in quart size or half-gallon containers, the WIC checks must specify the correct size container in order to purchase Lactaid or Dairy Ease. Participants needing their full allotment of milk as Lactaid or Dairy Ease should be assigned food packages for lactose-reduced quarts.

Often cheese and other processed or prepared dairy foods are tolerated in moderate amounts. An exception can be made to the 3 pound cheese limit for individuals who are lactose intolerant. Additional amounts of cheese may be issued up to the equivalent of the maximum fresh milk allotment. "Lactose-reduced quarts" and "lactose-reduced half-gallons" are tailored food packages and are available with increased amounts of cheese. Due to the higher cost of cheese versus milk, issuing cheese beyond the 3 pound limit must be kept to a minimum and used only when necessary. One or two extra pounds of cheese should be adequate for many individuals who experience a limited degree of intolerance.

UTILIZATION OF WIC FOODS

Due to individual food habits and preferences, a participant may not be able to use the maximum amount of foods available through the WIC Program. We definitely want to make the maximum amounts of food available if the participant needs and is able to use these amounts; but it benefits neither the participant nor the WIC Program to have food going to waste. The participant can be given recipes on alternative ways to use WIC foods.

Participants should be encouraged to use store discount cards and coupons when applicable.

Participants should be questioned at their certification to



determine the amounts of WIC foods they will be able to use. After they have participated on the Program for a while, encourage them to let you know if certain foods are usually left over at the end of the month so that you may adjust their food package at the next certification visit. Inform participants that they do not have to buy all of the foods on their WIC check each month if a particular food item is accumulating at home. If the food package is significantly altered due to underutilization of one or more WIC foods, this represents a type of tailoring.

PARTICIPANT PREFERENCE

For example, participants may choose to use their WIC checks to purchase some buttermilk along with regular milk.

DIETARY INTAKE

A participant's current dietary intake is another factor that may be considered in developing the WIC food package. There are some obvious instances where this type of tailoring would significantly benefit the participant and readily reinforce the nutrition education you provide. Examples are:

- A. if a diet history reveals few good sources of iron, the highest iron cereals and beans may be encouraged for this participant. These measures will maximize the iron content of the food package.
- B. if a history is inadequate in dairy products and the participant doesn't like milk but does like cheese, then issuing the three pound maximum of cheese may be appropriate. The participant should also receive recipes and tips on alternative ways to use milk.

Self
Check



QUESTIONS

46. Individual food package tailoring takes into account a participant's: (check the correct answers)

- a) Nutrition risk factors
- b) Food preferences
- c) Storage facilities
- d) Dietary intake
- e) Food habits
- f) Food allergies

47. Name two types of tailored food packages that could be assigned a participant with limited refrigerator storage:

- a) _____

- b) _____

48. Give two suggestions for tailoring food packages for an underweight participant:

- a) _____

- b) _____

49. Refer to the margin on Page 63. Check (✓) the WIC cereal listed below which is the highest in iron:

- Puffed Rice
- Cream of Wheat
- Puffed Wheat
- Malt-O-Meal
- Total

50. True or false? Most dried beans or legumes are higher in iron than peanut butter.
51. Name two WIC cereals that might be best suited to a participant with a chewing problem:
- a) _____
- b) _____
52. True or false? In Colorado, participants are not allowed to select foods, such as the type of cereal they prefer.
53. List two recommendations regarding tailored food packages you might make to a pregnant woman who was not gaining weight during her pregnancy:
- a) _____
- b) _____
54. Name a WIC cereal that contains no wheat:
- _____
55. True or false? WIC participants must purchase the full amount of all foods listed on their checks when they go to the grocery store.
56. True or false? If a WIC participant does not like eggs it would be acceptable to issue a tailored food package that does not contain eggs.
57. What are two tailoring measures that might be used for a participant whose dietary history was low in iron:
- a) _____
- b) _____

58. Check nutrition education tips that could be given to a participant with lactose intolerance:

- a) Drink a large amount of milk with lunch and dinner
- b) Use yogurt, cheese, or buttermilk
- c) Try milk in cooking rather than fresh milk
- d) Drink 2% or skim milk
- e) Drink very small amounts of milk at a sitting and see if this is tolerated

59. True or false? WIC participants can use store discount cards and coupons for WIC items.



ANSWERS

46. All answers are correct (a,b,c,d,e,f)

47. Any two of these answers:

- food packages for powdered or canned milk may be issued
- powdered infant formula may be issued instead of liquid concentrate
- food packages for single strength adult juice instead of frozen juice may be issued

48. Any two of these answers:

- Whole milk may be encouraged instead of lowfat milk
- Cheese may be encouraged as a snack food
- A food package including peanut butter, rather than beans, may be issued

49. Total

50. True

51. Any two of the following: Cream of Wheat, Malt-O-Meal, or Maypo (the hot cereals require no chewing)

52. False

53. Any two of these answers

- Encourage whole milk
- Issue a food package with more cheese (use for snacks)
- Issue a food package containing peanut butter rather than beans

54. Puffed Rice, Corn Chex, Rice Chex, Total (corn)

55. False

56. True

- 57. a) Issue beans instead of peanut butter
- b) Encourage the participant to buy the highest iron cereals such as Total

58. b,c,e

59. True

VII. DOCUMENTATION OF FOOD PACKAGE TAILORING

Does food package tailoring need to be documented?

Anytime tailored food packages are assigned due to risk factors or the participant's conditions, documentation must be included in the care plan. Documentation is critical so that all staff providing follow up can readily see that a specific tailored food package was purposefully assigned. If the tailoring is purely for participant preference, such as issuing beans instead of peanut butter, or canned juice instead of frozen juice, additional documentation is not necessary.

What information should be documented and where?

The reasons for tailoring, and the specific food package issued should be documented in the participant's care plan.

When should food package tailoring be documented?

The following are types of food package tailoring issues that require documentation:

Non-Contract, Low-Iron, Special and Metabolic Formulas

May be issued only with physician's authorization. There must be a physician's authorization form or prescription filed in the chart.

Ready-To-Feed (RTF) Formula

May be issued if there is a concern regarding the water supply or mother's ability to prepare formula as documented by the WIC nutritionist or nurse.

Reduced-Fat Milk for 1-2 Year Old

May only be issued to children under two years of age if specific criteria are met. These must be documented in the chart

Homeless Food Packages

May be issued for participants who are homeless or if there is no access to refrigeration.

Lowfat Food Packages

Recommended for overweight children (age 2-5) and overweight postpartum women. May be issued for overweight pregnant and breastfeeding women if deemed appropriate.

Extra Cheese

May be issued above the three pound maximum if the participant has been diagnosed as lactose intolerant.

Lactose-Reduced Quarts or Half-Gallons

May be issued if a participant has been diagnosed as lactose intolerant.

Goat Milk

May be issued to children and women only with a physician's authorization. There must be a physician's authorization form or prescription filed in the chart

Other

Food package tailoring should be documented when a participant is issued none of the maximum allotment of a food due to medical condition such as allergy, food preference, or food habits.

Examples of food package tailoring documentation:

1. Ellen Ambrose is an overweight postpartum woman. She would like to receive a lowfat food package. She prefers to receive 6 gallons of lowfat milk and no cheese.

In addition to information concerning the nutrition education provided, the following documentation should be included in the care plan for Ellen:

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

- Ellen states she prefers receiving lowfat milk and no cheese from WIC

ASSESSMENT/COUNSELING/PLAN

- High BMI
- Discussed diet for postpartum and weight loss
- Assigned lowfat food package NL203



2. Jane McNeil, a pregnant woman, is homeless. The shelter in which she has temporary residence has no cooking or refrigeration facilities for participants. The shelter will allow her to store nonperishable food items. Jane prefers to purchase 4# cheese and UHT box milk.

In addition to information concerning the nutrition education provided, the following documentation should be included in the care plan for Jane:

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

- Jane states she lives in a homeless shelter; she can store nonperishable foods but has no cooking or refrigeration facilities. Jane prefers receiving 4# cheese and UHT milk.

ASSESSMENT/COUNSELING/PLAN

- Jane requires a homeless food package
- Discussed diet for pregnancy, ways to use WIC foods
- Assign homeless food package PH307

3. Keisha Simmons is an 8 month old infant who has a prescription for Nutramigen because of severe multiple food allergies.

In addition to information concerning the nutrition education provided, the following documentation should be included in the care plan for Keisha:

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

- Mom states that Keisha has severe food allergies and can only tolerate Nutramigen.

ASSESSMENT/COUNSELING/PLAN

- Keisha needs full allotment of Nutramigen formula
- Discussed diet for age; purchasing & mixing Nutramigen
- Assign Nutramigen food package KS636
- Refer to RD for high risk counseling

NOTE: The MD's prescription for Nutramigen must be filed in the chart and a new prescription brought in 3 months.

4. Janet Wyler is an exclusively breastfeeding woman who reports that her doctor states she is lactose intolerant. She prefers to receive 5 pounds of cheese per month due to her lactose intolerance. She also wants to purchase Lactaid milk with her checks.

In addition to information concerning the nutrition education provided, the following documentation should be included in the care plan for Janet:

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

- Janet states she cannot drink milk; can drink Lactaid. Prefers to purchase 5# cheese per month.

ASSESSMENT/COUNSELING/PLAN

- Janet has documented lactose intolerance
- Discussed diet for breastfeeding & lactose intolerance; discussed uses for Lactaid
- Assign food package BT606
- Refer chart to RD for review
- Refer to RD/RN for high risk counseling

5. Joe Vargas is a 5-month old infant who is receiving RTF (ready-to-feed) formula (Enfamil) because his family's water supply is contaminated and unsafe to drink.

In addition to information concerning the nutrition education provided, the following documentation should be included in the care plan for Joe:

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

- Mom reports the family water supply is contaminated; requests RTF formula

ASSESSMENT/COUNSELING/PLAN

- Participant should be issued RTF formula
- Discussed use of RTF formula & diet for age
- Assign RTF Enfamil food package JN109
- Follow up next month

ANSWERS

60. Documentation of food package tailoring for Sam:

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

- Mom states she prefers to purchase lowfat milk, beans and only one pound of cheese with her WIC checks.

ASSESSMENT/COUNSELING/PLAN

- Wt/ht > 95%ile
- Discussed diet for age & weight control
- Assign lowfat food package CL201
- Refer to RD/RN for high risk counseling

61. Since this is a participant preference and not related to NRF's (unless calcium intake is low due to Amy's dislike of milk) or conditions, specific documentation as to why the tailored food package was chosen is not necessary. Documenting the fact that Amy doesn't like milk is helpful, however, since it will assist in follow up.

62. This is an example of a participant preference and not related to NRF's or conditions. Documenting the fact that Bobby likes cereal is helpful, however, in following up with later nutrition education sessions.

63. Documentation of food package tailoring for Carol:

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

- Mom reports that Carol is allergic to eggs and peanuts, but can eat other WIC foods

ASSESSMENT/COUNSELING/PLAN

- Carol is allergic to eggs and peanuts
 - Discussed diet for age; stressed avoidance of foods containing eggs and peanuts
 - Assign food package with no eggs or peanut butter, TT754
 - Refer chart to RD/RN for high risk counseling
-
-



VIII. ENCOURAGING THE USE OF WIC FOODS

Why is it important to emphasize WIC foods when providing nutrition education?

One of the simplest and most important messages you can give to your WIC participants is to **EAT THEIR WIC FOODS**. Don't underestimate the importance of this message or assume that participants will automatically eat the foods on their own. Remember, the WIC foods were chosen because they are nutritious and are high in nutrients that our WIC participants especially need. Having participants eat their WIC foods is vitally important to our success at helping them. In most cases, use of the WIC foods may help resolve the participant's nutrition risk factors. Clearly emphasize this with each participant.

How can WIC foods be incorporated into the nutrition education you provide?

There are several ways the WIC foods can be incorporated:

1. The WIC food packages for children and women include choices from each of the major food groups. To summarize:

<u>WIC Food</u>	<u>Food Group</u>
Milk, Cheese	Milk, Yogurt, Cheese
Eggs, Beans, Peanut Butter, Tuna	Meat, Poultry, Fish, Dry Beans, Eggs, Nuts
Cereal	Bread, Cereal, Rice, Pasta
Juice	Fruit Group and Vegetable Group
Carrots	Vegetable Group

Education Tip:

Use the Food Guide Pyramid to show where the WIC foods fit into the participant's diet.

When reviewing the dietary assessment with a participant, specific examples of ways to increase the intake from deficient food groups can be given. For example, if a participant's diet is low in the protein-rich group, suggest that they try eggs for breakfast, peanut butter or egg salad sandwiches for lunch, peanut butter and crackers for snacks, or bean soups for lunch or dinner. If the assessment was low in calcium-rich products, suggest a cheese omelet for breakfast, cheese sandwiches for lunch, powdered milk in soups, milk shakes, cheese sauces in baking, or milk with meals and snacks.

Education Tip:

Keep easy recipes on hand to share.

2. When reviewing the dietary assessment, you may also notice that the pattern of meals and snacks is not appropriate. Again, with WIC foods you can provide specific suggestions for improving the diet. For example, if the participant skips breakfast because they don't have time, suggest some breakfast ideas that can be prepared to go such as:

Some dry WIC cereal in a bag
with a cup of milk or juice

OR

Peanut butter sandwich
juice or milk

Education Tip:

Keep copies of nutrition labels from WIC foods, or the actual container, to educate participants on where to find and how to read the nutrient information.

3. The nutrient benefits of the WIC foods should be mentioned. For example, participants can be told that iron is an important nutrient and that WIC cereals are high in iron. Or, that low-sugar snacks should be given to children and that WIC cereals are low in sugar. Or, that we all need a source of vitamin C each day and that WIC juices are high in vitamin C.
4. The food package can be used to reinforce many principles of infant nutrition. Examples are:
 - a. Telling parents that solids should be delayed until at least 4 months and that's why the WIC Program does not provide cereal until this time.

Education Tip:

Have a pamphlet ready to show the infant's caregiver development stages to cue in when baby is ready for solids.

- b. Telling parents that juice should be given only in a cup, not in a bottle, and that's why the WIC Program does not provide juice until 7 months of age.
- c. Telling parents that iron-fortified formula is the best alternative to breast milk and that's why the WIC Program supplies only iron-fortified formula for the first year of life (unless there is a medical reason and a Physicians Authorization for Non-Iron Formula).

Is it necessary to explain to participants how to use WIC foods?

Yes, it is very important to explain to participants how to use the WIC foods. There may be certain foods such as dried beans that are unfamiliar. It is possible that they won't use these foods unless you give them specific recipes or ideas. Even for foods such as fresh milk, cheese, cereal, or peanut butter that most people are very familiar with, it is helpful to give nutritious recipes and perhaps some new ways of using them. This may increase the frequency with which these foods are used and may lead to generally more nutritious meals and snacks.

Are there special nutrition education requirements for homeless individuals?

Yes, providing effective and appropriate nutrition education to homeless persons requires that staff have an understanding of the participant's transient lifestyle. Because a participant may only be enrolled for a short period of time, ongoing, long-term education goals may not be appropriate. Priority topics to be covered include: (1) how to use the WIC check, (2) what are WIC-allowable foods, and (3) referral to other services.

Education Tip:

Find out if there are foods that are new to the participant. Some participants may have never tried cheese before.

Education Tip:

Focus on the participant's specific needs.

Topics for possible discussion include:
(1) use of WIC foods with an emphasis on food safety, sanitation, and storage,
(2) fast and easy nutritious snacks, and
(3) preparation of foods that require little or no cooking.

**Self
Check**



QUESTIONS

64. True or false? Most participants will eat their WIC foods and it's probably not worth staff time to encourage that they do so.
65. If a participant's 24-hour recall is low in the meat/meat alternative group, list 3 specific suggestions for improving the diet through use of WIC foods that can be given:
66. True or false? Participants should be given recipes for using WIC foods.



ANSWERS

64. False!
65. Any 3 of the following are examples;
 - Egg salad sandwich
 - Peanut butter and jelly sandwich
 - Eggs for breakfast
 - Peanut butter and crackers for snacks
 - Bean soups for lunch or supper
66. True

Congratulations!! You have completed the WIC Food Package Module. The module post test is attached.



IX. SUMMARY OF COLORADO WIC FOOD PACKAGES

The WIC food package content, incorporating Colorado's tailoring guidelines, are summarized below:

WIC FOOD PACKAGE CONTENTS

	Formula	Infant Cereal	Infant Juice	Adult Juice	Fresh Milk	Cheese	Eggs	Peanut Butter or Beans	Carrots	Tuna	Adult Cereal
Infant 0-3 mos.	31 (13 oz.) conc or 8 (1 lb.) pwd or 25 32-oz RTF (or equiv)										
Infant 4-5 mos.	31 (13 oz.) conc or 8 (1 lb.) pwd or 25 32-oz RTF (or equiv)	1-2 8-oz. boxes									
Infant 6-12 mos.	31 (13 oz.) conc or 8 (1 lb.) pwd or 25 32-oz RTF (or equiv)	1-3 8-oz. boxes	2 32-oz. containers								
Child 1 yr.				6 12-oz. frozen or 6 46-oz single strength	21 qts.	2 lbs. may replace 6 qts. milk	2 doz.	18 oz. peanut butter or 1 lb. beans			28 oz.
Child 2-5 yrs.				6 12-oz. frozen or 6 46-oz single strength	21 qts.	2 lbs. may replace 6 qts. milk	2 doz.	18 oz. peanut butter or 1 lb. beans			36 oz.
Pregnant/BF Woman				6 12-oz. frozen or 6 46-oz single strength	28 qts.	2 lbs. may replace 6 qts. milk	2 doz.	18 oz. peanut butter or 1 lb. beans			36 oz.
Exclusively BF Woman				7 12-oz. frozen or 7 46-oz single strength	28 qts.	1 lb. (2 add'l lbs. may replace 6 qts. milk)	2 doz.	18 oz. peanut butter or 1 lb. beans plus 1 lb. beans	2 lbs.	26 oz. water packed, canned	36 oz.
PP Woman				4 12-oz. frozen or 4 46-oz single strength	24 qts.	2 lbs. may replace 6 qts. milk	2 doz.				36 oz.
Special Dietary Needs	35 (13 oz.) conc or 9 (1 lb.) pwd (or equiv)			3 12-oz. frozen or 3 46-oz single strength							36 oz.

Lactose Intolerance: May receive up to the equivalent of fresh milk allotment as cheese (child 7 lb., postpartum woman 8 lb., pregnant/breastfeeding 9 lb.+1 quart milk, exclusively breastfeeding 10 lb. + 1 quart milk)

UNAUTHORIZED FOODS IN THE COLORADO WIC PROGRAM

INFANT FORMULA

Any formula not specified in the Colorado WIC Food Package

INFANT CEREAL

Cera Meal
Wet Pack
Dry Pack with fruit or sweeteners
Dry Pack with formula - Milupa

FRUIT JUICE

Fruit Drink
Tang
Hi-C
Fruit Punch
Hawaiian Punch
Fruit Nectars
Lemonade
Sweetened Juice
Calcium Fortified Orange Juice

MILK

Raw milk or non-pasteurized
Yogurt
Half and Half
Hot Chocolate Mix
Chocolate Drink
Chocolate Milk
Powdered Buttermilk
Milnot
Sweetened Condensed Milk

CHEESE

Deli cheese
Shredded cheese
Individually wrapped cheese
Cheese foods
Cheese spreads
Cheese products
Flavored cheese
Cream cheese
Cottage cheese
Imported cheese
Sliced cheese (except American)
String Cheese

CEREALS

Any hot or cold cereal except those specified on WIC checks

points)



Post Test

2 pts. 1. True or false? It is part of the Federal Regulations for the WIC Program to encourage all pregnant women to breastfeed, unless a health problem would prevent it.

7 pts. 2. Breastfeeding is considered to be the best way to feed young infants because: (check all that apply)

- a) it provides immunizing protection against certain diseases
- b) it is the only way to build a trusting relationship between mother and baby
- c) it is the only food on which infants grow well
- d) it is clean and not easily contaminated
- e) it does not supply all the nutrients needed by the young infant
- f) it promotes a close, affectionate relationship between mother and infant
- g) it is a nutritionally complete food for the first 4-6 months of life

4 pts. 3. Which formulas require a physician's written prescription before they can be issued to an infant on the WIC Program? (check all that apply)

- a) contract soy formula
- b) "special" formulas
- c) contract cow's milk formula
- d) all formula

5 pts. 4. Why is iron-fortified formula considered to be the best alternative to breast milk? (check all that apply)

- a) the iron in the formula can help prevent iron-deficiency anemia
- b) it is a nutritionally complete food for the first 4-6 months of life
- c) it has been modified to be easier to digest than fresh cow's milk
- d) it usually causes colic, spitting up, and diarrhea
- e) the young infant can absorb the iron and store it for later use at an age when he may be switched to fresh cow's milk

3 pts. 5. Which is the correct procedure for issuing low-iron formula?

- a) low-iron formula may be issued if a parent tells you that this is the formula that the baby's doctor recommended
- b) it may only be issued for infants less than 4 months of age with an MD's prescription or a completed Physician's Authorization Form for low-iron formula
- c) any infant under 4 months of age can receive low-iron formula upon request from the parents

- 2 pts. 6. True or false? WIC provides the full amount of formula needed by most healthy infants.
- 3 pts. 7. Why should care be taken not to issue too much supplemental formula to a breastfed infant?
- a) it is too expensive
 - b) a mother might inadvertently interfere with successful nursing if she supplements too often with formula
 - c) breastfed infants usually don't tolerate formula well
- 4 pts. 8. Why is powdered formula encouraged for breastfed infants?
- a) mothers generally prefer it
 - b) it is easier to mix
 - c) it has a longer storage life and gives the mother the flexibility to mix exactly the amount she needs each day
 - d) infants generally prefer it
- 4 pts. 9. Why is cereal not issued on the WIC Program until at least 4 months of age? (check all that apply)
- a) there is no nutritional need for solids before 4-6 months of age
 - b) parents usually don't want to start cereal until 4 months
 - c) developmentally, the infant is not ready for solids until 4-6 months of age
 - d) the infant may be more prone to food allergies if solids are introduced too early
- 4 pts. 10. Iron-fortified infant rice cereal is a good first food for babies because: (check all that apply)
- a) it is a good iron source
 - b) it is an excellent source of vitamin C
 - c) it is a single grain cereal
 - d) it is not apt to cause an allergic reaction
- 4 pts. 11. Why is the issuance of juice on the WIC Program delayed until 7 months of age? (check all that apply)
- a) it is too expensive
 - b) there is no nutritional need for juice during 0-7 months of age
 - c) juice should be fed only from a cup, not a bottle, to avoid the tendency to use sweet liquids in the bottle as a pacifier which may cause tooth decay
 - d) babies are generally highly allergic to any kind of juice until at least 6 months of age
- 2 pts. 12. True or false? Food Package IN100 contains formula, infant cereal, and infant juice.
- 4 pts. 13. Ready-to-feed formula may be issued: (check all that apply)
- a) if the family's water supply is unsafe
 - b) if the mother prefers RTF formula
 - c) if a working parent requests it because it is more convenient
 - d) if there is doubt about the caretaker's ability to properly mix the powdered or concentrated formula

- 4 pts. 14. Why are only certain juices allowed on the WIC Program? (check all that apply)
- a) they supply vitamin C (at least 30 mg of vitamin C per 100 ml or 60% of the U.S. RDA per 4 oz)
 - b) they are the least expensive ones
 - c) they are 100% real juice
 - d) they are the ones people like best

- 5 pts. 15. Why are only certain brands of cereals allowed on the WIC Program? (check all that apply)
- a) they are the least expensive
 - b) they are high in iron (at least 45% of the U.S. RDA per 1 ounce)
 - c) they are high in sugar
 - d) they are high in all major vitamins and minerals
 - e) they are low in sugar

- 4 pts. 16. Why is there a 3 pound limit on the amount of cheese that can be issued to children and women?
- a) cheese is more expensive than milk
 - b) participants generally don't like cheese as well
 - c) cheese has artificial coloring
 - d) it is very difficult to use cheese in cooking

- 8 pts. 17. For each WIC food listed below, list the major food group to which it belongs:

FOOD GROUP

- | | |
|------------------|-------|
| a) milk | _____ |
| b) juice | _____ |
| c) cheese | _____ |
| d) eggs | _____ |
| e) legumes/beans | _____ |
| f) cereals | _____ |
| g) carrots | _____ |
| h) tuna | _____ |

- 7 pts. 18. Match each WIC food on the left with the major nutrients it supplies on the right: (Hint: C can be used more than once)

- | | |
|-------------------------------------|---------------------|
| (1)___ milk and cheese | a) iron, folate |
| (2)___ juice | b) protein |
| (3)___ cereal | c) protein and iron |
| (4)___ eggs | d) protein, calcium |
| (5)___ peanut butter, beans/legumes | e) vitamin C |
| (6)___ tuna | f) vitamin A |
| (7)___ carrots | |

20 pts. 19. Match the food package description on the left hand side to supporting nutrition principle (2 pts. each)

- | | |
|---------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| __1. The food package contains milk, cheese, eggs, cereal, juice, and beans or peanut butter | a) These food packages provide similar amounts of nutrients but less fat and calories; help to reinforce nutrition education and teach sound eating habits |
| __2. 21 quarts per month is the milk allotment for children | b) The iron need among WIC participants is high; low sugar foods reinforce principles of good nutrition and dental health |
| __3. Postpartum women receive less food than pregnant/breastfeeding women | c) This amount is adequate to meet nutrient needs, particularly calcium, without supplying an excess amount which would spoil the appetite for other foods |
| __4. Pregnant/breastfeeding women receive more milk per month than postpartum women | d) These foods are high in iron, protein, calcium, vitamin A, and vitamin C; they represent servings from each of the major food groups and can be used to supplement a well-balanced diet |
| __5. Lowfat food packages are recommended for overweight children and overweight postpartum women | e) Pregnant/breastfeeding women need more calcium and protein than postpartum women |
| __6. The cereals on the WIC Program are limited to those high in iron and low in sugar | f) This amount is enough to help meet iron needs without supplying an excess amount that may go to waste |
| __7. Juices are limited to those high in vitamin C and with no added sugar | g) Limits the use of this relatively expensive food item, but still allows variety in the food package |
| __8. Nonfat milk is not allowed until 2 years of age | h) Nonfat milk is relatively high in protein and salt and low in fat, particularly linoleic acid for the young child |
| __9. 2 pound standard issuance of cheese | I) Foods without added sugar reinforce principles of good nutrition and dental health; ones highest in vitamin C can best help to meet the daily nutrient needs |
| __10. The cereal limit is 28 ounces for the 1-2 year old | j) The nutrient needs for postpartum women are less than for pregnant or breastfeeding women |

2 pts. 20. True or False? "Special" food packages are for women or children who need formula.

2 pts. 21. True or False? Puffed Rice is the only WIC cereal that contains no wheat.

2 pts. 22. True or False? Most beans or legumes are higher in iron than peanut butter.

10 pts. 23. Match the phrase on the left with the correct answer on the right. (Hint: Not all answers (2 pts. each)
on the right will be used and "c" will be used more than once.)

- | | |
|-------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------|
| <input type="checkbox"/> 1) Food package suggestions for WIC participants with limited refrigerator storage | <input type="checkbox"/> a) Assign a homeless food package or one with canned or powdered milk; issue powdered infant formula |
| <input type="checkbox"/> 2) Suggestions for an underweight participant | <input type="checkbox"/> b) Issue a lowfat food package; encourage lowfat cheeses |
| <input type="checkbox"/> 3) WIC cereals that might be best suited to a participant with a chewing problem | <input type="checkbox"/> c) Encourage cheese. Whole milk may be recommended. |
| <input type="checkbox"/> 4) Suggestions for a pregnant woman who is not gaining enough weight | <input type="checkbox"/> d) Cream of Wheat and Malt-O-Meal and Maypo |
| <input type="checkbox"/> 5) Food package suggestions for the anemic participant | <input type="checkbox"/> e) Corn Chex and Puffed Rice |
| | <input type="checkbox"/> f) Issue a food package containing beans; encourage the participant to buy Total cereal |

4 pts. 24. Advantages to food package tailoring include: (check all that apply)

- a) helps prevent waste
- b) represents a better use of WIC funds
- c) reinforces nutrition education
- d) helps to best meet the specific nutrition needs of participants

6 pts. 25. Individual food package tailoring takes into account a participant's: (check all that apply)

- a) nutrition risk factors
- b) food preferences
- c) storage facilities
- d) dietary intake
- e) food habits
- f) food allergies

5 pts. 26. How should the following tailoring be documented?

Jimmy McNeil is a 4 year old overweight child. His mother requests to receive the lowfat food package. She selects 1 pound of cheese and beans every month.

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

-
-

ASSESSMENT/COUNSELING/PLAN

-
-
-

5 pts. 27. How should the following be documented?

Chris Martinez is a 5 month old infant. He receives 31 13-oz cans of Enfamil with iron, 2 boxes of cereal, and no juice.

PARTICIPANT COMMENTS/FOLLOW UP ON GOALS & REFERRALS

-
-

ASSESSMENT/COUNSELING/PLAN

-
-
-

8 pts. 28. If a child's 24-hour recall was low in dairy products, what are examples of how WIC foods could be used to improve the diet? The intake in all other food groups was adequate. (check all that apply)

- a) cheese and crackers for snacks
- b) grilled cheese sandwiches for lunch
- c) cottage cheese on fruit
- d) dry WIC cereals for breakfast or snacks
- e) juice for breakfast
- f) cream cheese on toast for breakfast
- g) peanut butter and crackers
- h) milk used in soups or baking

2 pts. 29. True or False? A woman believes she is lactose intolerant. You can offer her a standard food package because it would allow her to try up to 1 gallon of lactose-reduced milk with her checks.