

March 2024

WELLNESS WEDNESDAY

**Build a Balanced Plate to
Promote Healthy Aging and
Brain Health**

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Learning Outcomes

By the end of this webinar, you will:

Appreciate the importance of building a balanced plate using Canada's food guide

Feel able to assess your meals and snacks for balanced nutrition

Develop confidence to try new recipes and tips to eat a more balanced plate at meals and snacks

Our Time Together Today

Part One: Healthy Eating for Healthy Aging

Evidence into Action:
Canada's food guide (2019)

- Macronutrients
- Food groups

Balanced Plate Activity

Part Two: Let's get Cooking!

- Zippy Herby Dip
- Hearty Lentil Wrap
- Braised Proteins with Greens
- Mixed Grain Pilaf

Q&A

Healthy Aging

WHO defines healthy ageing as “the process of developing and maintaining the functional ability that enables wellbeing in older age.”

Functional ability requires the *mental* and *physical* capacities that a person can draw on and includes their ability to walk, think, see, hear and remember.



How can healthy eating help you with healthy aging?

Keep energy levels up

Remain independent

Maintain good mental health

Stay positive

Prevent or manage chronic disease

Maintain a healthy body composition



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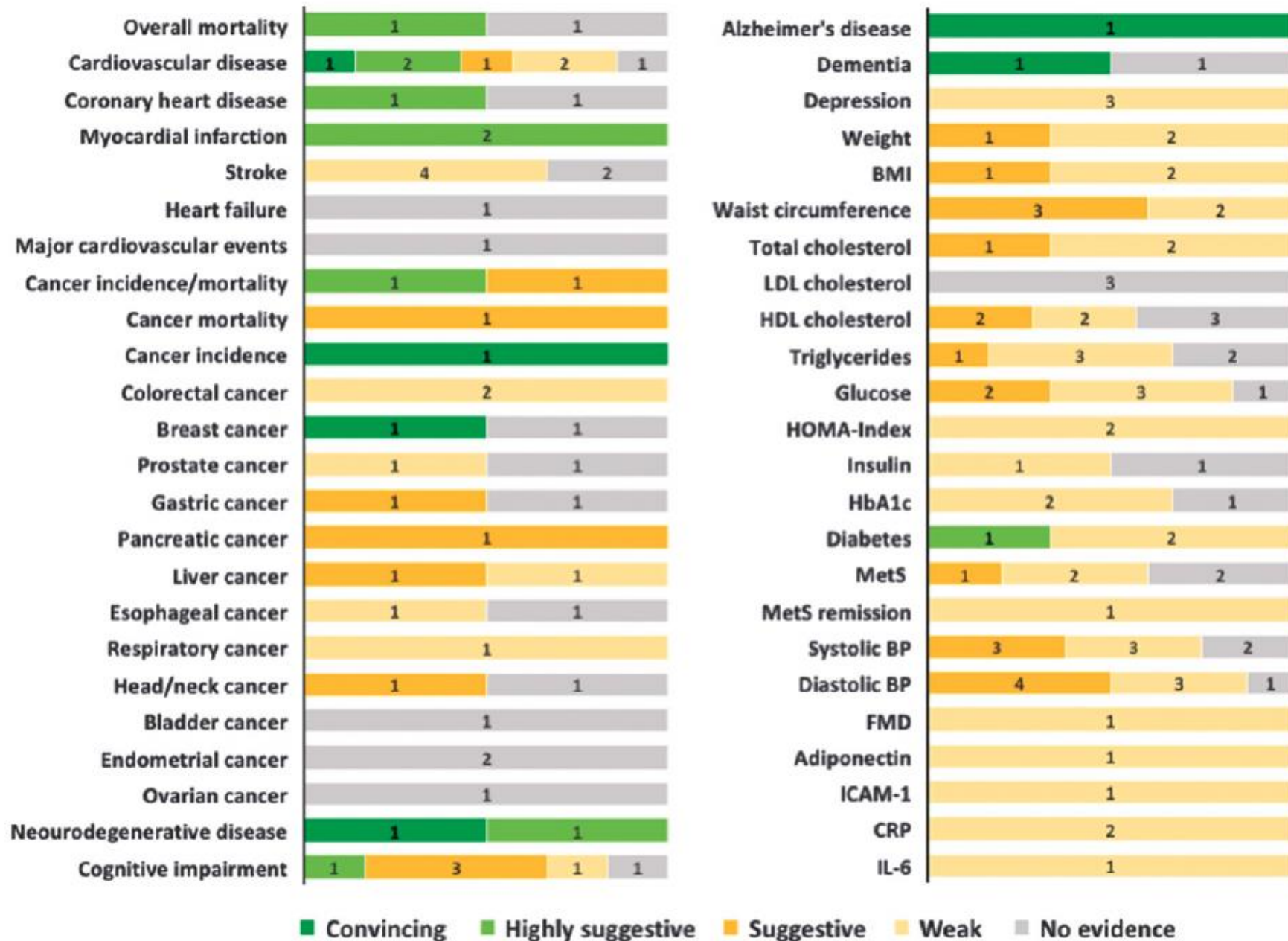


Figure 4. Summary of the strength of evidence for the evaluated health outcomes. Numbers indicate the number of meta-analyses with convincing, highly suggestive, suggestive, weak or no evidence for each outcome.



Brain Health

WHO defines brain health as “the state of brain functioning across cognitive, sensory, social-emotional, behavioural and motor domains, allowing a person to realize their full potential over the life course, irrespective of the presence or absence of disorders.”

How can healthy eating impact brain health?

- “Brain Health is not independent of the body’s general health status” (Ekstrand, B. et al. 2021)
- Improvement of overall dietary quality is related to reduced depressive symptoms. (Firth, J. et al. 2019)
- Healthy dietary patterns, such as **Mediterranean** diet, **MIND**¹ diet, and **DASH**² diet are associated with reduced cognitive decline. (Ekstrand, B. et al. 2021; Morris, M.C. et al. 2015)
- Mediterranean diet is related to reduced risk of neurodegenerative diseases. (Dinu, M. et al. 2018)
- Several individual nutrients (omega-3, curcumin, etc.) have been proposed to potentially promote brain health. However, conclusive evidence is lacking.

¹MIND: Mediterranean-DASH Intervention for Neurodegenerative Delay

²DASH: Dietary Approaches to Stop Hypertension

WHAT IS THE DIFFERENCE BETWEEN
THE **MIND**, **DASH** AND **MEDITERRANEAN DIET**?

ENCOURAGE
CONSUMPTION



AVOID
OR LIMIT

SIMILARITIES

	DASH	MIND	MED	
POULTRY 	✓	✓	○	
EGGS 	✓	✓	○	
LOW FAT DAIRY 	✓	?	○	
BERRIES 	?	✓	?	
SEEDS 	✓	?	✓	
CHEESE 	✓	✗	○	
WINE 	✗	✓	✓	
FRUIT 	✓	?	✓	
LEGEND	 ENCOURAGE CONSUMPTION	 CONSUME IN MODERATION	 AVOID OR LIMIT	 NOT SPECIFIED

DIFFERENCES

Canada's Food Guide (CFG)

Have plenty of vegetables and fruits

Eat protein foods

Make water your drink of choice



Choose whole grain foods

Healthy Eating is More Than the Foods You Eat



Be mindful of your eating habits



Cook more often



Enjoy your food



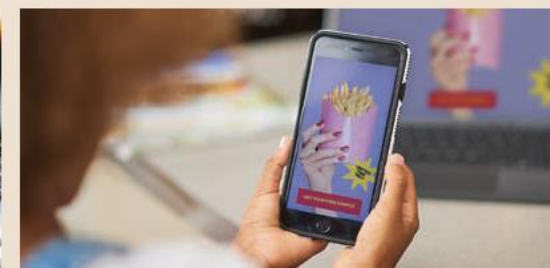
Eat meals with others



Use food labels



Limit foods high in sodium, sugars or saturated fat



Be aware of food marketing

Consideration Behind the Balanced Plate

Macronutrients provide energy and maintain the systems and structures of your body.

- Carbohydrate
- Protein
- Fat

Micronutrients helps with energy metabolism (turn the macronutrients in to energy!) and support regular tissue function.

- Vitamins (Vitamin A, B, C, D, E, K etc)
- Minerals (Ca, Fe, I, Mg, Na, Se, Zn etc.)



What is Protein

An essential part of your diet

- ❖ Builds, maintains and repairs your body
- ❖ Keeps muscles strong and your hair, nails and skin healthy
- ❖ Helps you heal if you've been ill or have had surgery

Can you name a few food sources of protein?

Eat protein foods



Sources of Protein

Meat, seafood, poultry, eggs

Milk, cheese, yogurt, kefir

Nuts, seeds

Legumes (peas, beans and lentils) and soy products (tofu, soy beverages)

Whole grains

Can you think of any protein food options that require minimal / no prep time?



What is Carbohydrate

Nutrients for your brain, heart, lungs and other organs to function.

Fuel to keep you active.

- ❖ Before exercise to keep you energetic
- ❖ After exercise to support repair and recovery

Which food group(s) contain carbohydrates?

Have plenty of vegetables and fruits

Eat protein foods

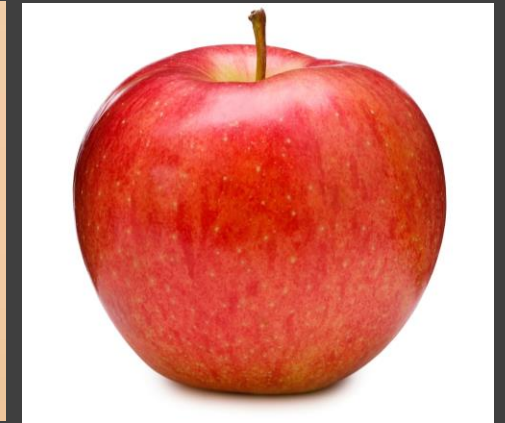
Make water your drink of choice



Choose whole grain foods

What is Carbohydrate

- Three main types of Carbohydrate:
 - **Sugar:** digested quickly and send immediate bursts of glucose (energy) into the bloodstream.



What is Carbohydrate

- 2) **Starches:** complex carbohydrates digested more slowly and supply a slower release of glucose into the bloodstream.



What is Carbohydrate

3) Fibre

Substance found naturally in plants

Helps lower blood cholesterol levels, control blood sugar and helps prevent high blood pressure

Helps to keep you satisfied and full for longer

Keeps your digestive system working and regular

Some types of fibre are “Prebiotics” - food for beneficial microorganisms in our gut





Sources of Fibre

Whole grains: Oats, barley, wheat, quinoa, brown rice, black rice buckwheat and, bulgur, corn and popcorn

Breads, baked goods and pastas made with “whole grains” (check the food labels)

Vegetables and fruit

Legumes (peas, beans and lentils)

Nuts and seeds (esp flaxseeds and chia seeds)

You can get
carbohydrate
from all food
groups!

Have plenty of
vegetables and fruits

Eat protein foods

Make water
your drink
of choice

Choose
whole grain
foods



What is Fat

Supplies your body with energy

Build the structure of your cell membrane

An essential nutrient in our diet (cannot be generated within our body)

Types of fat

- ❖ Unsaturated fats
- ❖ Saturated Fat
- ❖ Trans Fat

Have plenty of
vegetables and fruits

Eat protein foods

Make water
your drink
of choice



Choose
whole grain
foods

Unsaturated Fat

Unsaturated fats are usually liquid at room temperature. They are predominantly found in foods from plants and fish/seafood.

Including unsaturated fat as part of a healthy diet can improve blood cholesterol levels and promote heart health.

Food sources:

- ❖ Oily or fatty fish
- ❖ Nuts and seeds
- ❖ Vegetable oils (olive, peanut, canola and sesame oil)
- ❖ Wheat germ
- ❖ Avocados
- ❖ Foods fortified with omega-3, such as eggs, yogurt and soy beverages





Food Group: Fruit and Vegetables

Macronutrients:

- Carbohydrate – both simple and complex carbohydrate (starch, fibre)
- Fat – mainly unsaturated
- Protein – fruit and vegetables are not a significant sources

Micronutrients:

- Fruit and vegetables are “nutrient dense” foods, meaning they have more nutrients for the same amount of energy (Calories), compared to other foods.
- They are good source of vitamins and minerals, such as folate, vitamin C, vitamin E, magnesium, and potassium etc.
- Nutrient content varies depending on the types. That’s why it is recommended to include variety in your diet!

Food Group: Grains

Macronutrients:

- Carbohydrate – complex carbohydrate (starch, fibre)
- Fat – mainly unsaturated, higher in whole grain
- Protein – whole grain has higher protein content than refined grain

Micronutrients:

- Whole grain or whole grain products that include all 3 parts - bran, germ, and endosperm are sources of B vitamins, vitamin E, iron, copper, zinc, magnesium, antioxidants, and phytochemicals.
- Refined grain, the endosperm part, provides carbohydrates, protein, and small amounts of some B vitamins and minerals.





Food Group: Protein Foods

Macronutrients

- Protein
- Carbohydrate – starches and fibre in plant-based protein foods such as tofu, beans, lentils, certain vegetables
- Fat – plant-based protein foods contain mostly unsaturated fats; animal-based protein foods (except fish/seafood) contain mainly saturated fats

Micronutrient

- Depending on the specific type of protein foods, they can provide vitamin A, B vitamins, iron, zinc, and calcium.

Activity

—

How to Make A Balanced Plate

Reminder:

What is a balanced plate?

- ❖ All three food groups
- ❖ Varieties of different fruits and vegetables
- ❖ Sources of unsaturated fats

Have plenty of
vegetables and fruits

Eat protein foods

Make water
your drink
of choice



Choose
whole grain
foods

What could you add to
make a Balanced Plate?

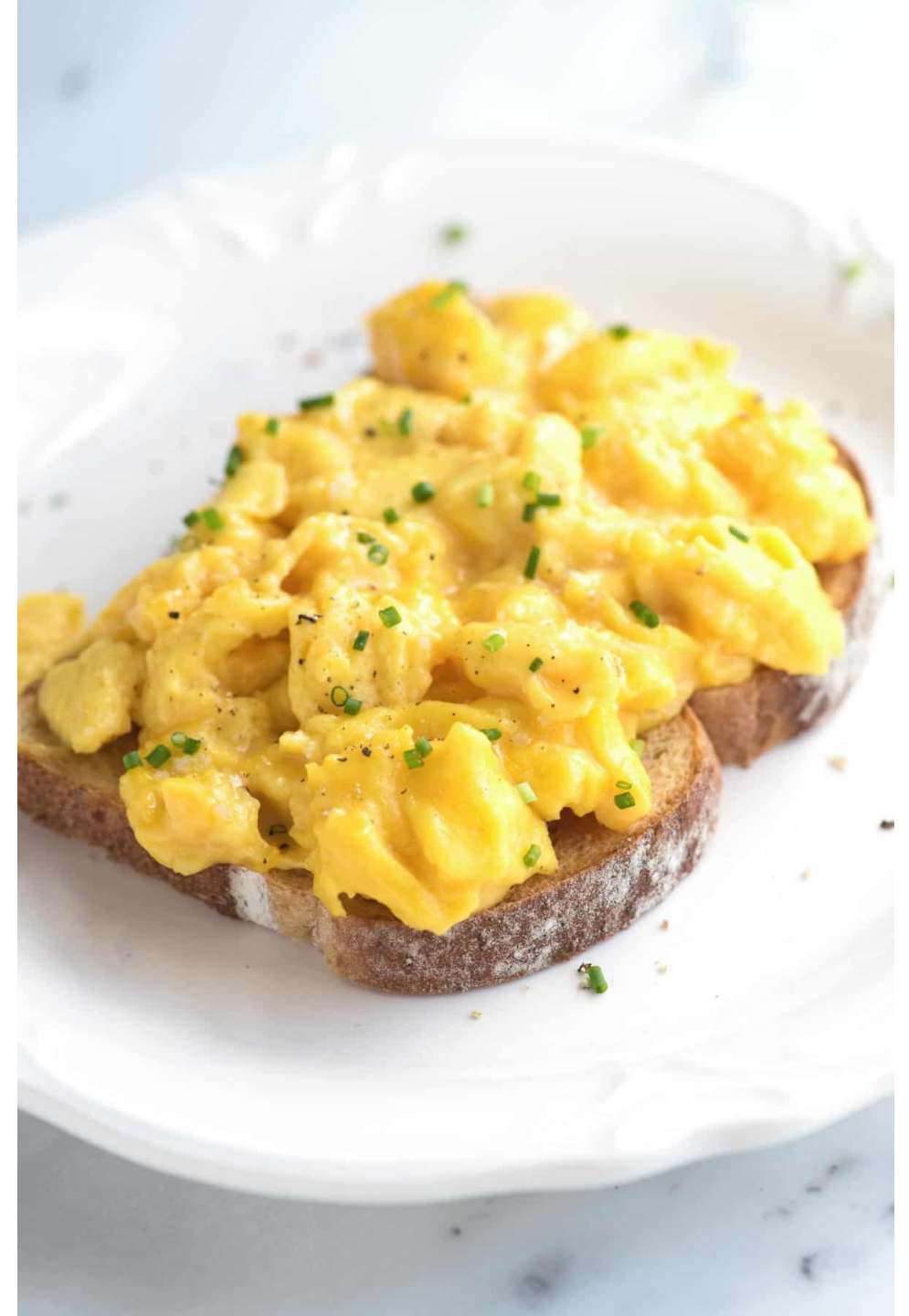
❖ Kale salad with Cajun Salmon

[Irena Macri, 2019](#)



What could you add to make a Balanced Plate?

❖ Scrambled Eggs on Whole Wheat Toast



What could you add to make a Balanced Plate?

❖ Whole Wheat Pasta Primavera



What could you add to make a Balanced Plate?

- ❖ Everything Whole Grain Crackers
Lindsay Landis, 2021 and
- ❖ Cucumber Slices



Lindsay Landis, 2021

What could you add to
make a Balanced Plate?

❖ Spicy Chicken Ramen

[Tiffy Chen, 2020](#)



Reflect: What's your mid-day meal today?

Is it Balanced?

- ❖ Protein Foods
- ❖ Whole Grains
- ❖ Vegetables and Fruits (variety of colours and types)
- ❖ Heart-healthy fats (unsaturated)

What could you add to balance or increase the nutrition of this meal?

- ❖ Lean Proteins
- ❖ Unsaturated fats instead of saturated fats
- ❖ Higher fibre grains
- ❖ Colourful veggies and fruits

Two Minute Stretch Break

As we move to the kitchen!

Let's Get Cooking!

- Zippy Herby Dip
- Hearty Lentil Wrap

- Braised Proteins with Greens
- Mixed Grain Pilaf



Recipe Demos

Recipes available online:

We Are Dietitians!

Outpatient Nutrition Clinic/ Community Dietitians – Free with referral

- ❖ Ask your doctor/physiotherapist/nurse practitioner to refer

HealthLinkBC – Free to all BC Residents

- ❖ call [8-1-1](tel:8-1-1) (or [7-1-1](tel:7-1-1) for the deaf and hard of hearing) toll-free in B.C.
- ❖ Email a HealthLinkBC Dietitian (enter the link <https://www.healthlinkbc.ca/healthy-eating-physical-activity/email-healthlinkbc-dietitian> or directly search the key word on Google)

Private Practice Dietitians – Partially covered or free (with extended health insurance)

- ❖ Dietitians of Canada - <https://www.dietitians.ca/search.aspx?searchtext=find+a+dietitian&searchmode=allwords>
- ❖ BC Dietitians - <https://bcdietitians.ca/>

Questions and Answers



Upcoming Nutrition Month Events

Dietetics Students are coming to BC Brain Wellness exercise classes!

- "Nutrition Moments"
- March 8th to 27th

Student-led Nutrition Workshops

- March 12th – Cooking for one or two
- March 15th – Protective aging with protein
- March 22nd – Plant-based food

Please register – and share your feedback!



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