



# NUTRITION & WELLNESS

## Military Families Learning Network

**Enhancing Health and Wellness with Probiotics**  
**May 19<sup>th</sup>, 2021; 11am-12:00pm EDT**

### References

- Asha MZ, Khalil SFH. "Efficacy and Safety of Probiotics, Prebiotics and Synbiotics in the Treatment of Irritable Bowel Syndrome: A systematic review and meta-analysis." *Sultan Qaboos Univ Med J* 20(1):e13-e24. <https://doi:10.18295/squmj.2020.20.01.003>
- Cai J, Zhao C, Du Y, Zhang Y, Zhao M, Zhao Q. "Comparative Efficacy and Tolerability of Probiotics for Antibiotic-associated Diarrhea: Systematic Review with Network Meta-analysis." *United European Gastroenterol J*. 2018;6(2):169-180. <https://doi:10.1177/2050640617736987> .
- Cho, Y. A., and J. Kim. 2015. "Effect of Probiotics on Blood Lipid Concentrations: A Meta-Analysis of Randomized Controlled Trials." *Medicine (Baltimore)* 94 (43):e1714. <https://doi.org/10.1097/md.0000000000001714>.
- Dimidi E, Christodoulides S, Fragkos KC, Scott SM, Whelan K. The effect of probiotics on functional constipation in adults: a systematic review and meta-analysis of randomized controlled trials. *Am J Clin Nutr*. 2014;100(4):1075-1084. <https://doi.org/10.3945/ajcn.114.089151>
- Food and Agricultural Organization of the United Nations and World Health Organization. 2002. Joint FAO/WHO working group report on drafting guidelines for the evaluation of probiotics in food. Food and Agricultural Organization of the United Nations. [https://www.who.int/foodsafety/fs\\_management/en/probiotic\\_guidelines.pdf](https://www.who.int/foodsafety/fs_management/en/probiotic_guidelines.pdf)
- Goldenberg, J. Z., S. S. Ma, J. D. Saxton, M. R. Martzen, P. O. Vandvik, K. Thorlund, G. H. Guyatt, and B. C. Johnston. 2013. "Probiotics for the Prevention of *Clostridium Difficile*-Associated Diarrhea in Adults and Children." *The Cochrane Database of Systematic Review* (5):Cd006095. <https://doi.org/1002/14651858.CD006095.pub3>.
- Gong, Y., Y. Li, and Q. Sun. 2015. "Probiotics Improve Efficacy and Tolerability of Triple Therapy to Eradicate *Helicobacter Pylori*: A Meta-Analysis of Randomized Controlled Trials." *The International Journal of Clinical and Experimental Medicine* 8 (4):6530–43.
- Gruner, D., S. Paris, and F. Schwendicke. 2016. "Probiotics for Managing Caries and Periodontitis: Systematic Review and Meta-Analysis." *Journal of Dentistry* 48:16–25. <https://doi.org/10.1016/j.jdent.2016.03.002>.
- Hao, Q., B. R. Dong, and T. Wu. 2015. "Probiotics for Preventing Acute Upper Respiratory Tract Infections." *The Cochrane Database of Systematic Review* 2:Cd006895. <https://doi.org/10.1002/14651858.CD006895.pub3>.
- Health Canada. 2009. "Accepted Claims About the Nature of Probiotic Microorganisms in Food." Accessed March 30, 2020. [http://hc-sc.gc.ca/fn-an/label-etiquet/claims-reclam/probiotics\\_claims-allegations\\_probiotiques-eng.php](http://hc-sc.gc.ca/fn-an/label-etiquet/claims-reclam/probiotics_claims-allegations_probiotiques-eng.php).



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Hill, C., F. Guarner, G. Reid, G. R. Gibson, D. J. Merenstein, B. Pot, L. Morelli, R. B. Canani, H. J. Flint, S. Salminen, P. C. Calder, and M. E. Sanders. 2014. "Expert Consensus Document. The International Scientific Association for Probiotics and Prebiotics Consensus Statement on The Scope and Appropriate Use of the Term Probiotic." *Nature Reviews Gastroenterology & Hepatology* 11 (8):506–14.

<https://doi.org/10.1038/nrgastro.2014.66>.

Ikram, S., N. Hassan, M. A. Raffat, S. Mirza, and Z. Akram. 2018. "Systematic Review and Meta-Analysis of Double-Blind, Placebo-Controlled, Randomized Clinical Trials Using Probiotics in Chronic Periodontitis." *Journal of Investigative and Clinical Dentistry* 9 (3):e12338. <https://doi.org/10.1111/jicd.12338>.

Jafarnejad, S., S. Shab-Bidar, J. R. Speakman, K. Parastui, M. Daneshi-Maskooni, and K. Djafarian. 2016. "Probiotics Reduce the Risk of Antibiotic-Associated Diarrhea in Adults (18–64 Years) but Not the Elderly (>65 Years): A Meta-Analysis." *Nutrition in Clinical Practice* 31 (4):502–13.

<https://doi.org/10.1177/0884533616639399>.

King, S., D. Tancredi, I. Lenoir-Wijnkoop, K. Gould, H. Vann, G. Connors, M. E. Sanders, J. A. Linder, A. L. Shane, and D. Merenstein. 2018. "Does Probiotic Consumption Reduce Antibiotic Utilization for Common Acute Infections? A Systematic Review and Meta-Analysis." *European Journal of Public Health* 29 (3):494-499.

<https://doi.org/10.1093/eurpub/cky185>.

Koutnikova, H., B. Genser, M. Monteiro-Sepulveda, J. M. Faurie, S. Rizkalla, J. Schrezenmeir, and K. Clément. 2019. "Impact of Bacterial Probiotics on Obesity, Diabetes and Non-Alcoholic Fatty Liver Disease Related Variables: A Systematic Review and Meta-Analysis of Randomised Controlled Trials." *BMJ* 9 (3):e017995.

Lahner, E., C. Bellisario, C. Hassan, A. Zullo, G. Esposito, and B. Annibale. 2016. "Probiotics in the Treatment of Diverticular Disease. A Systematic Review." *Journal of Gastrointestinal and Liver Diseases* 25 (1):79–86.

<https://doi.org/10.15403/jgld.2014.1121.251.srw>.

Lau, C. S., and R. S. Chamberlain. 2016. "Probiotics Are Effective at Preventing *Clostridium Difficile*-Associated Diarrhea: A Systematic Review and Meta-Analysis." *International Journal of General Medicine* 9:27–37.

<https://doi.org/10.2147/ijgm.s98280>.

Li, B. Z., D. E. Threapleton, J. Y. Wang, J. M. Xu, J. Q. Yuan, C. Zhang, P. Li, Q. L. Ye, B. Guo, C. Mao, and D. Q. Ye. 2015. "Comparative Effectiveness and Tolerance of Treatments For *Helicobacter Pylori*: Systematic Review And Network Meta-Analysis." *BMJ* 351:h4052. <https://doi.org/10.1136/bmj.h4052>.

Li, C., X. Li, H. Han, H. Cui, M. Peng, G. Wang, and Z. Wang. 2016. "Effect of Probiotics on Metabolic Profiles in Type 2 Diabetes Mellitus: A Meta-Analysis of Randomized, Controlled Trials." *Medicine (Baltimore)* 95 (26):e4088. <https://doi.org/10.1097/md.0000000000004088>.



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Lu, M., S. Yu, J. Deng, Q. Yan, C. Yang, G. Xia, and X. Zhou. 2016. "Efficacy of Probiotic Supplementation Therapy for *Helicobacter pylori* Eradication: A Meta-Analysis of Randomized Controlled Trials." *PLoS One* 11 (10):e0163743. <https://doi.org/10.1371/journal.pone.0163743>.

Lu, D., J. Yan, F. Liu, P. Ding, B. Chen, Y. Lu, and Z. Sun. 2019. "Probiotics in Preventing and Treating Chemotherapy-Induced Diarrhea: A Meta-Analysis." *Asia Pacific Clinical Nutrition Society* 28 (4):701-710. [https://doi.org/10.6133/apjcn.201912\\_28\(4\).0005](https://doi.org/10.6133/apjcn.201912_28(4).0005).

Lv, Z., B. Wang, X. Zhou, F. Wang, Y. Xie, H. Zheng, and N. Lv. 2015. "Efficacy and Safety of Probiotics as Adjuvant Agents for *Helicobacter Pylori* Infection: A Meta-Analysis." *Experimental and Therapeutic Medicine* 9 (3):707–716. <https://doi.org/10.3892/etm.2015.2174>.

Ma, Y., J. Y. Yang, X. Peng, K. Y. Xiao, Q. X., and C. Wang. 2020. "Which Probiotic Has the Best Effect on Preventing Clostridium Difficile-Associated Diarrhea? A Systematic Review and Network Meta-Analysis." *Journal of Digestive Diseases* 21 (2):69-80. <https://doi.org/10.1111/1751-2980.12839>.

McFarland, L. V. 2016. "An Observation on Inappropriate Probiotic Subgroup Classifications in the Meta-Analysis by Lau and Chamberlain." *International Journal of General Medicine* 9:333–336. <https://doi.org/10.2147/ijgm.s119970>.

McFarland, L. V., Y. Huang, L. Wang, and P. Malfertheiner. 2016. "Systematic Review and Meta-Analysis: Multi-Strain Probiotics as Adjunct Therapy for *Helicobacter Pylori* Eradication and Prevention of Adverse Events." *United European Gastroenterology Journal* 4 (4):546–61. <https://doi.org/10.1177/2050640615617358>.

McFarland, L. V., C. T. Evans, and E. J. Goldstein. 2018. "Strain-Specificity and Disease-Specificity of Probiotic Efficacy: A Systematic Review and Meta-Analysis." *Frontiers in Medicine* 5 (124). <https://doi.org/10.3389/fmed.2018.00124>.

McFarland, LV, P Malfertheiner, Y Huang, and L Wang. 2015. "Meta-Analysis of Single Strain Probiotics for the Eradication of *Helicobacter Pylori* and Prevention of Adverse Events." *World Journal of Meta-Analysis* 3 (2):97–117.

Miller, L. E., A. K. Zimmermann, and A. C. Ouwehand. 2016. "Contemporary Meta-Analysis of Short-Term Probiotic Consumption on Gastrointestinal Transit." *World Journal of Gastroenterology* 22 (21):5122–31. <https://doi.org/10.3748/wjg.v22.i21.5122>.

Oelschlaeger, T. A. 2010. "Mechanisms of Probiotic Actions - A Review." *International Journal of Medical Microbiology* 300 (1):57-62. <https://doi.org/10.1016/j.ijmm.2009.08.005>.



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Pattani, R., V. A. Palda, S. W. Hwang, and P. S. Shah. 2013. "Probiotics for The Prevention of Antibiotic-Associated Diarrhea and *Clostridium Difficile* Infection Among Hospitalized Patients: Systematic Review and Meta-Analysis." *Open Medicine* 7 (2):e56–67.

Samah, S., K. Ramasamy, S. M. Lim, and C. F. Neoh. 2016. "Probiotics for The Management of Type 2 Diabetes Mellitus: A Systematic Review and Meta-Analysis." *Diabetes Research and Clinical Practice* 118:172–182. <https://doi.org/10.1016/j.diabres.2016.06.014>.

Sanchez, B., S. Delgado, A. Blanco-Miguez, A. Lourenco, M. Gueimonde, and A. Margolles. 2016. "Probiotics, Gut Microbiota and Their Influence on Host Health and Disease." *Molecular Nutrition and Food Research* <https://doi.org/10.1002/mnfr.201600240>.

Schwenger, E. M., A. M. Tejani, and P. S. Loewen. 2015. "Probiotics for Preventing Urinary Tract Infections in Adults and Children." *Cochrane Database of Systematic Review* (12):Cd008772. <https://doi.org/10.1002/14651858.CD008772.pub2>.

Shi, X., J. Zhang, L. Mo, J. Shi, M. Qin, and X. Huang. 2019. "Efficacy and Safety of Probiotics in Eradicating Helicobacter Pylori: A Network Meta-Analysis." *Medicine* 98 (15): e15180-e15180. <https://doi.org/10.1097/MD.00000000000015180>.

Szajewska, H., and M. Kolodziej. 2015a. "Systematic Review with Meta-Analysis: *Lactobacillus Rhamnosus* GG in the Prevention of Antibiotic-Associated Diarrhoea in Children and Adults." *Alimentary Pharmacology & Therapeutics* 42 (10):1149–57. <https://doi.org/10.1111/apt.13404>.

Szajewska, H., and M. Kolodziej. 2015b. "Systematic Review with Meta-Analysis: *Saccharomyces Boulardii* in the Prevention of Antibiotic-Associated Diarrhoea." *Alimentary Pharmacology & Therapeutics* 42 (7):793–801. <https://doi.org/10.1111/apt.13344>.

Tenorio-Jiménez, C., M. J. Martínez-Ramírez, A. G., and C. Gómez-Llorente. 2020. "Effects of Probiotics on Metabolic Syndrome: A Systematic Review of Randomized Clinical Trials." *Nutrients* 12 (1):124. <https://doi.org/10.3390/nu12010124>.

Wang, Y. H., N. Yao, K. K. Wei, L. Jiang, S. Hanif, Z. X. Wang, and C. X. Pei. 2016. "The Efficacy and Safety of Probiotics for Prevention of Chemoradiotherapy-Induced Diarrhea in People with Abdominal and Pelvic Cancer: A Systematic Review and Meta-Analysis." *European Journal of Clinical Pharmacology* 70(11):1246–1253. <https://doi.org/10.1038/ejcn.2016.102>.

Wang, Z. B., S. S. Xin, L. N. Ding, W. Y. Ding, Y. L. Hou, C. Q. Liu, and X. D. Zhang. 2019. "The Potential Role of Probiotics in Controlling Overweight/Obesity and Associated Metabolic Parameters in Adults: A Systematic Review and Meta-Analysis." *Evidence-Based Complementary and Alternative Medicine* : eCAM 2019:3862971-3862971. <https://doi.org/10.1155/2019/3862971>.



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Zhang, Q., Y. Wu, and X. Fei. 2016a. "Effect of Probiotics on Glucose Metabolism in Patients with Type 2 Diabetes Mellitus: A Meta-Analysis of Randomized Controlled Trials." *Medicina (Kaunas)* 52 (1):28–34. <https://doi.org/10.1016/j.medici.2015.11.008>.

Zhang, Y., L. Li, C. Guo, D. Mu, B. Feng, X. Zuo, and Y. Li. 2016b. "Effects of Probiotic Type, Dose and Treatment Duration on Irritable Bowel Syndrome Diagnosed By Rome III Criteria: A Meta-Analysis." *BMC Gastroenterology* 16 (1):62. <https://doi.org/10.1186/s12876-016-0470-z>.

Zhang, C., J. Jiang, F. Tian, J. Zhao, H. Zhang, Q. Zhai, and W. Chen. 2020. "Meta-analysis of randomized controlled trials of the effects of probiotics on functional constipation in adults." *Clinical Nutrition* 39(10):2960-2969. <https://doi.org/10.1016/j.clnu.2020.01.005>

## Resources

### 1.) Benefaction of Probiotics for Human Health: A Review

[Benefaction of probiotics for human health: A review - ScienceDirect](#)

This literature review discusses the history of the discovery of probiotics, describes some sources of food that are naturally rich with probiotics, and the anti-diabetic properties of some probiotics. Probiotics have also been known to help reduce inflammation and reduce obesity.

### 2.) A Guide to Probiotics and Health

[pdf\F5\F528600.pdf \(ufl.edu\)](#)

This informative PDF by our speaker Wendy J. Dahl defines probiotics, discusses the health benefits associated with probiotics (such as improving digestive health, boosting metabolism, and preventing cavities), and provides some tips on purchasing probiotics.

3.) This is a "Practice Tool to Assist with Clinical Decision Making for Appropriate Probiotic Therapy for Your Patients." This guide is designed to translate scientific evidence available for probiotic products to practical, clinically relevant information. It is intended to be used as a clinical decision-making tool, enabling clinicians to easily select the appropriate product, dose, and formulation for a specific indication.



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[www.usprobioticguide.com](http://www.usprobioticguide.com)

### **4.) Go with Your Gut: Understanding Microbiota and Prebiotics**

[pdf\FS\FS17100.pdf \(ufl.edu\)](#)

Wendy J. Dahl from the University of Florida's IFAS Extension describes the purpose of microbiota in the large intestine and explains what prebiotics are and their role in balancing the microbiota.

### **5.) Frequently Asked Questions About Probiotics**

[Probiotics FAQ Guide --- Probiotics.org](#)

This organizational website by a doctor discusses probiotic supplements via a buying guide for authentic probiotics, a summary of the different forms of probiotics (ex: kombucha, pill probiotics, and powdered probiotics), and an explanation of prebiotics (which promote probiotic growth).

### **6.) How to Pick the Best Probiotic for You**

[How to Pick the Best Probiotic for You – Health Essentials from Cleveland Clinic](#)

An intestinal microbe specialist explains how probiotics can help one regain gastrointestinal balance after IBS or ulcerative colitis. The author then explains the criteria for a probiotic to be a true probiotic and lists some examples of probiotic-rich foods.

### **7.) The Seven Best Vegan Probiotics for True Vegans**

[The 7 Best Vegan Probiotics in 2020 \[For True Vegans\] \(minorityhealth.org\)](#)

This organizational website takes into consideration that not all probiotic food sources are vegan-friendly and provides information on how to discern which sources of probiotics are in fact vegan. This website also clears the misconception that the lactobacillus strain of probiotics contains dairy, which is not true. Lactobacillus can be found in dairy products but does not necessarily contain any trace of milk.

### **8.) Prebiotics, Probiotics, and Your Health**



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[Prebiotics, probiotics and your health - Mayo Clinic](#)

This organizational website by the Mayo Clinic elaborates on what prebiotics are, what probiotics are, and emphasizes the importance of talking to a doctor about probiotics before purchasing any supplements.

### **9.) Probiotics for Food Allergies and Intolerances**

[Probiotics for Food Allergies & Intolerances \(probioticscenter.org\)](#)

This organizational website by the Probiotics Center explains how to slowly incorporate probiotics into the diet without triggering allergies. It also discusses the GAPS diet and talks about the benefits of probiotics for reducing other allergies.