

2014 Science of Supplements: SUMMER ISSUE

Sylvan Wellness, Inc.

90 Glade Dr.
 Kittanning, PA 16201
 Phone: (866) 352-7520
 Email: swinfo@sylvanwellness.com
 Website: www.sylvanwellness.com



Red Yeast Rice—Why Sourcing Matters

Red yeast rice (RYR), the centuries-old staple of both Chinese cuisine and medicine, has been the subject of numerous clinical trials, all of which point to a similar conclusion. Quality, both in raw materials and during the manufacturing process, is crucial.

RYR is produced by fermenting a fungus, *Monascus purpureus*, over moist rice. The process results in several metabolites belonging to the monacolin family of polyketides, along with fatty acids, and trace elements.¹ The combination of these compounds has been found to be beneficial in maintaining healthy LDL levels.

“RYR has not only been shown to lower cholesterol, but also to lower heart attack risk safely and effectively,” said Jacob Teitelbaum, MD, a board-certified internist, nationally known integrative medicine authority, and author of eight books including *Real Cause*, *Real Cure* (Rodale)* and the popular free iPhone & Android app Cures A-Z. “Combined with improving diet and optimizing thyroid and other hormone functions, RYR is an excellent tool for optimizing health in those with elevated cholesterol levels.”

In 1999, the *American Journal of Clinical Nutrition* (AJCN) published a double-blind, placebo-controlled, randomized 12-week study in which 83 healthy subjects received either a rice powder placebo or red yeast rice. To separate the effects of diet, subjects were asked to adhere to the American Heart Association’s Step 1 Diet (<30 percent fat, <10 percent saturated fat, and <300 mg cholesterol/day). Lipid information, including total cholesterol, total triacylglycerol, and HDL and LDL cholesterol levels, was collected at the start of the study, then at weeks eight, nine, 11 and 12.

The researchers reported that the red yeast rice group experienced statistically significant reductions in total cholesterol, LDL cholesterol, and total triacylglycerol concentrations compared with the placebo group. At the same time, no significant changes were observed in HDL cholesterol levels.²

More recently, *Missouri Medicine*, the official journal of the Missouri Medical Association, published an overview of RYR, which looked at five studies in addition to the AJCN report. The overview found that LDL reductions ranged from 21-32 percent, triglyceride reductions ranged from 13-44 percent, and no significant impact was seen in HDL concentrations. Among the conclusions: RYR, taken in 1,200 to 4,800 mg/day divided doses, is effective in lowering total and LDL-C in dyslipidemic patients.³

The article also raised an important issue. In looking at the RYR used in clinical studies, the authors suggested that additional studies were needed using RYR preparations with standardized composition. Additionally, the authors recommended that anyone using RYR should seek out “a formulation manufactured by a company that documents the safety, purity, and composition of its product.”

“Combined with improving diet and optimizing thyroid and other hormone functions, RYR is an excellent tool for optimizing health in those with elevated cholesterol levels.”

— Jacob Teitelbaum, MD

Controlling Raw Materials

The recommendation aligns with the quality standards established by Sylvan Bio, Inc., Kittanning, PA, maker of Sylvan Red Yeast Rice. The sole RYR manufacturer in the U.S. for more than a decade, Sylvan has distinct quality advantages according to Gary Walker, president. “Sylvan’s production is conducted entirely in the United States,



which gives us optimal control of incoming organic raw materials and the manufacturing process,” said Walker. “In addition, we bottle our material under GMP (good manufacturing practices) and we have traceability of each batch produced in our facilities.”

Apart from raw materials and manufacturing, Sylvan verifies product quality with thorough product testing. “Each batch of Sylvan’s Red Yeast Rice is rigorously tested for any unwanted human pathogens, heavy metals and non-detectable levels (less than 1 part per million) of citrinin, a nephrotoxin found in red yeast rice,” said Walker. “The naturally occurring ingredients are standardized to insure that our customers are provided a consistent product year after year.”

References:

- 1 Ma J, Li Y, Ye Q, Li J, Hua Y, Ju D, Zhang D, Cooper R, Chang M. Constituents of red yeast rice, a traditional Chinese food and medicine. *Journal of Agricultural and Food Chemistry*, 2000 Nov; 48 (11), 5220-5225.
 - 2 Heber D, Yip I, Ashley JM, Elashoff D, Elashoff RM, Go VLW. Cholesterol-lowering effects of a proprietary Chinese red yeast rice dietary supplement. *American Journal of Clinical Nutrition*, 1999 Feb; 69 (2), 231-236.
 - 3 Shamim S, Al Badarín FJ, DiNicolantonio JJ, Lavie CJ, O’Keefe JH. *Missouri Medicine*, 2013 Jul-Aug; 110 (4), 349-54.
- *Teitelbaum, J., MD, Gottlieb, B. (2012). *Real Cause, Real Cure*. New York, NY: Rodale Press.

