



Tart cherry extract holds the key to a **'fruitful'** sleep

New CHERRYYoung™ ingredient shows evidence that tart cherry can **promote better sleep** to feel and look well rested.

A quick internet search—or an honest talk with, well, anyone—reveals that the state of sleep in the U.S. is not stellar. According to [a recent Gallup poll](#), just 1 in 3 adults reported getting “excellent” or “very good” sleep the previous night. Equally as many reported that their sleep was “fair” or even “poor.”

In recent years, consumers have caught on to the fact that poor sleep [is detrimental to overall health](#), and they're turning to supplements for natural support. As a result, the natural products market for healthy sleep has more than doubled in size since 2017 to reach a value of \$1.29 billion.¹

To answer this growing demand, companies are looking to create formulas with natural, botanical ingredients that are both effective and familiar to consumers. Take tart cherry, traditionally known for support of healthy joints and often taken as a juice. A new nutraceutical ingredient from Ming Chyi Biotechnology, Ltd. (MCB) called CHERRYYoung™, originating from the tart cherry, fits the bill. Grown in the temperate climate, fertile

soils, and clean water and air of Austria, the cherries' juice is extracted and concentrated before entering a patented fiber encapsulation process that ensures the stability of the active ingredients. The result is a bioavailable, low-humidity, powder formulation that's extremely soluble for use in a range of applications including powdered supplements, sachets, tablets and capsules, gummies, ready-to-drink beverages and functional foods.

CHERRYYoung boasts more than 50% dietary fiber, over 80,000 ppm polyphenols, and an ORAC (Oxygen Radical Absorbance Capacity) score of over 1,000 (indicating a high antioxidant capacity).

HOW DOES IT WORK?

Although the mechanism of action for tart cherry and sleep support is not yet well understood, emerging evidence ties it to melatonin, the sleep hormone which helps regulate the sleep-wake cycle and is produced in part by the body's stores of an amino acid called tryptophan. It is believed that by protecting against the degradation of

tryptophan, CHERRYYoung promotes the production of melatonin and increases the potential for a better night's rest.

RESEARCH-BACKED BENEFITS

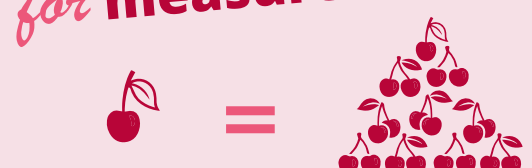
Poor sleep is an increasingly common issue marked by many symptoms including trouble falling asleep, staying asleep, or getting good quality sleep. For some, this is a minor inconvenience; for others, it can be life-altering. The good news is that research shows tart cherry can improve sleep duration and quality, although the research surrounding CHERRYYoung specifically is only just emerging.

MCB has conducted one proprietary study on CHERRYYoung that evaluated 20 participants with sleep disturbances. Subjects consumed one pack of tart cherry extract powder (consisting of 500 mg CHERRYYoung and 4.5 grams of FiberJuice™) dissolved in water three hours before bed every day for one week. Not only did participants report improved sleep quality, but they also reported improvements in work concentration and daytime fatigue.

These findings confirm the more substantial body of research on tart cherry juice for better sleep. One such study examined the effects of five servings of tart cherry juice over the course of two days, versus placebo.² Uniquely, this study took place during an overnight training camp, so participants' nutrition, movement schedules, and sleep schedules were fairly controlled.

Wearable devices were used to measure participants' sleep quality over the course of four nights, and significant improvement was observed in variables of sleep quality such as

Measure for measure



1 gram CHERRYYoung = **60 grams** of raw tart cherry

CHERRYYoung recommended dosage: **450-500 mg**

total time in bed, the time of waking after sleep onset and movement during sleep.

INCREASED MELATONIN EQUALS BETTER SLEEP QUALITY

As noted above, the power of tart cherry to help promote better sleep lies, in part, in its ability to naturally support the body's production of melatonin. In one randomized, double-blind, placebo-controlled, crossover study, 20 volunteers took either tart cherry juice concentrate or placebo for seven days.³ Data collected from wearable devices and sleep questionnaires showed that tart cherry, on average: decreased sleep onset time by 8 minutes; increased total sleep time by 34 minutes; and boosted sleep efficiency (time spent in bed versus time actually sleeping) by 7.2%.

In another randomized, double-blind, crossover study, participants took a tart cherry beverage or placebo for two weeks each, separated by a



CHERRYOUNG™ IS:



Natural



Allergen-free



Non-GMO



Vegan

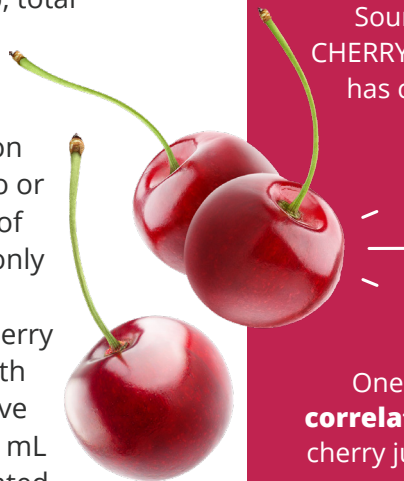


Free of added sugars

two-week washout period.⁴ Participants completed sleep diaries to determine changes in sleep onset, waking after falling asleep, total sleep time, and sleep efficiency. Ultimately, the tart cherry juice beverage was associated with statistically significant improvements on all sleep variables, with effects equal to or better than those observed in studies of valerian, another nutraceutical commonly used for sleep support.

Another study examined how tart cherry improves sleep quality. Participants with sleep issues were randomized to receive either placebo or tart cherry juice (240 mL twice daily) for two weeks each, separated by a two-week washout period. In addition to completing five validated questionnaires, participants underwent a sleep study and a blood test. In the end, tart cherry juice increased sleep efficiency and sleep time—to the tune of 84 minutes on average.⁵

As a bonus, tart cherry extract may also reduce some of the unwanted characteristics of not sleeping well. It is commonly understood that quality sleep supports mending oxidative stress and the antioxidant-rich standardized polyphenols in CHERRYYoung help protect skin cells against oxidative damage. Poor sleep, quite literally, can show up on the face. In a proprietary study, participants who supplemented with 500 mg CHERRYYoung for one week reported improvements in dark circles, eye puffiness and skin conditions. Indeed, this may offer a “sleeping beauty” benefit!



Tart cherry for holistic wellness

Sounder sleep isn't the only benefit of CHERRYYoung. Clinical research on tart cherry has confirmed body wide benefits for...



Joint health

One research review found a **positive correlation** between the consumption of tart cherry juice and a decrease in serum uric acid concentration—a marker of joint pain.⁶



Sports performance

Tart cherry is rich in polyphenols, providing overall wellness, anti-inflammatory and antioxidant benefits. In fact, one study showed that intake of tart cherry juice during the 48 hours following intermittent exercise can reduce the body's production of IL-6, an inflammation marker.⁷

Further, a study conducted on 16 semi-professional soccer players showed that the **intake of tart cherry juice after exercise can significantly reduce delayed onset muscle soreness** while increasing muscle strength by 19%.⁸

References

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