Light Therapy for Bipolar Disorder  by Lisa A. Miles

Light therapy for seasonal affective disorder (SAD) has been studied for some time now. Usually it comes to mind with the onset of depression in winter. But more applications have been coming to the forefront.

Recently, a post on Psych Central had information about sleep and cognition improving with light therapy after brain injury. Now a researcher at Western Psychiatric Institute and Clinic (WPIC) in Pittsburgh is looking further into using light therapy to treat bipolar disorder.

Also known as “bright light therapy” or “phototherapy,” light therapy treats SAD by exposure to artificial light, which mimics natural light lacking during late fall and winter. According to an article by Reuters Health, “(…) Research suggests that bright light can affect levels of certain brain chemicals, like serotonin, thought to be involved in major depression. Light therapy also seems to zero in on the same brain structures that antidepressants target.” Others across the web have argued that a certain type of blue light is optimally effective for depressive conditions.

Both John Hopkins Medical Center and the Mayo Clinic caution that light boxes may arouse manic symptoms if used without supervision, but both prestigious centers nod to Dr. Dorothy Sit’s research as the noted study. Sit is an assistant professor of psychiatry at Western Psychiatric Institute and Clinic in Pittsburgh.

At WPIC, that latest research is being set up to examine “adult men and women with bipolar disorder depression” because too few effective treatments for the condition exist. As “drugs indicated for bipolar disorder mainly improve symptoms of mania or hypomania,” the renowned institute and clinic wants to better address the opposite side of the spectrum. Few nondrug treatments have been found effective so far.

In 2007, WPIC conducted a similar but much less extensive study, according to Dr. Sit, lead researcher of both studies. She admits what was discovered then became hopeful grounds to build a case for more research going forward. She states that “(…) There is still no clear indicator as of yet that light therapy is effective for bipolar disorder,” but she nevertheless feels “there is great justification for the new study.”
Fewer than 10 individuals, all women, were studied in 2007. In 2013, 40 to 60 men and women ages 18 to 65 will be evaluated. The light box being used this time has been optimized for best treatment outcomes over the last five years.

“There is simply not enough information out there, and [this is] why we are conducting the new trial,” Dr. Sit said. “We want to confirm the studies, the [light] dose, the optimum timing of the therapy during the course of a day, and the overall efficacy.”

As well, Dr. Sit mentioned the good opportunity to look at the interrelationship between bipolar disorder and circadian rhythm. In a 2008 article on Psych Central, she said:

“People with bipolar disorder are exquisitely sensitive to morning light, so this profound effect of morning treatment leading to mixed states is very informative and forces us to ask more questions ... Did we introduce light too early and disrupt circadian rhythms and sleep patterns?”