

# SSRI Cuts Frequency, Severity of Hot Flashes

BY MARY ANN MOON

FROM JAMA

The selective serotonin reuptake inhibitor escitalopram rapidly reduces the frequency and severity of hot flashes in menopausal women, according to a report.

In a multicenter, randomized clinical trial comparing 10 or 20 mg per day of escitalopram with placebo, the drug's benefit "was only modestly less than that reported in a meta-analysis of estrogen therapy," said Ellen W. Freeman, Ph.D., of the department of obstetrics and gynecology at the University of Pennsylvania, Philadelphia, and her associates.

"Our findings suggest that among healthy women, 10 to 20 mg/d of escitalopram provides a nonhormonal, off-label option that is effective and well tol-

erated in the management of menopausal hot flashes," they said.

The double-blind trial involved 205 women who were in the menopausal transition, were postmenopausal, or had undergone hysterectomy with one or both ovaries intact. Ninety-five of the women self-reported as African American, 102 as white, and 8 as other. These subjects recorded at least 28 hot flashes or night sweats per week in a daily diary for 3 weeks before enrollment, or hot flashes or night sweats rated as bothersome or severe 4 or more days per week.

The women were randomized to receive 10 mg oral escitalopram or a matching placebo for 8 weeks. If they did not show a reduction in hot flash frequency or at least a 50% reduction in hot flash severity at 4 weeks, the dose was escalated to 20 mg of active drug or placebo.

At baseline, the mean frequency of hot flashes was 9.78 per day. After 8 weeks, that decreased by nearly half, to 5.26 per day in women taking escitalopram. This reduction was significantly greater than the 33% decrease to 6.43 hot flashes per day in the placebo group.

A total of 55% of women receiving active drug showed a decline of at least 50% in hot flash frequency, compared with 36% of women receiving placebo. Similarly, 19% of the escitalopram group showed a decline of at least 75% in hot flash frequency, com-

pared with only 9% of the placebo group.

Data from the study subjects' daily diaries showed that every week for the duration of the study, the frequency of hot flashes was significantly decreased in the escitalopram group compared with the



**Significant improvement in hot flash frequency and severity was shown within 1 week of starting escitalopram.**

DR. FREEMAN

placebo group, Dr. Freeman and her colleagues said (JAMA 2010;305:267-74).

Escitalopram also diminished the severity of hot flashes by 24%, compared with a decrease of 14% with placebo. Seventy percent of women taking the active drug reported satisfaction with treatment, compared with 43% of those taking placebo.

These benefits were consistent across all subgroups of subjects, regardless of the women's race, menopausal status, depression scores, or anxiety scores.

Treatment response was rapid, with women in the escitalopram group showing significant improvement in hot flash frequency and severity within 1 week of starting treatment, the investigators noted.

The study subjects were followed up about 3 weeks after discontinuing their study medication. Hot flash frequency had rebounded by a significantly greater amount in the escitalopram group (7.18 hot flashes per day) than in the placebo

group (6.65 hot flashes per day), as had the severity of hot flashes.

Sixty-four percent of the women taking escitalopram said they wanted to continue taking their assigned medication, compared with only 42% of those in the placebo group.

"It is noteworthy that women who were not clinically anxious or depressed responded to escitalopram," which suggests that the mechanism underlying the drug's effect on hot flashes may differ from that underlying its effect in psychiatric conditions. This finding also supports the hypothesis that serotonin receptors play a role in the pathogenesis of hot flashes, Dr. Freeman and her associates said.

Overall, 53% of women taking escitalopram and 63% taking placebo reported newly emergent adverse effects, none of which were serious. Nine women in the escitalopram group and two in the placebo group discontinued treatment because of adverse events, including dizziness, vivid dreams, nausea, and excessive sweating.

Dr. Freeman and her colleagues reported that to their knowledge, their clinical trial is the first to examine whether racial differences exist in response to SSRI treatment for hot flashes. Previous studies have shown that African American women are more likely to report hot flashes than their white counterparts.

However, Dr. Freeman found that "race did not significantly affect the response to escitalopram in the present study."

Additional studies are needed to compare the efficacy of SSRIs and selective serotonin norepinephrine inhibitors in treating hot flashes related to menopause, they reported. ■

## VITALS

**Major Finding:** Escitalopram decreased the frequency of hot flashes by nearly half, from 9.78 per day to 5.26 per day.

**Data Source:** An 8-week multicenter, randomized, double-blind clinical trial involving 205 women.

**Disclosures:** This study was supported by the National Institute of Aging, the Eunice Kennedy Shriver National Institute of Child Health and Development, the National Center for Complementary and Alternative Medicine, the Office of Research on Women's Health, the Indiana Clinical and Translational Sciences Institute, and the National Center for Research Resources. Forest Laboratories provided the escitalopram and placebo pills. Dr. Freeman reported ties to Forest Laboratories, Wyeth, Pfizer, Xanodyne Pharmaceuticals, Pherin Pharmaceuticals, and Bayer Health Care, and her associates also reported ties to numerous drug companies.

## Blood Type, Ovarian Reserve Linked

BY BRUCE JANCIN

FROM THE ANNUAL MEETING OF THE AMERICAN SOCIETY FOR REPRODUCTIVE MEDICINE

DENVER – Infertile women with blood type O have an increased prevalence of diminished ovarian reserve, according to Dr. Edward J. Nejat.

In contrast, the A blood group antigen, comprising blood types A and AB, appears to be protective against diminished ovarian reserve, he reported at the meeting.

These are novel findings whose clinical implications must await further study, added Dr. Nejat of Albert Einstein College of Medicine, New York.

He presented a cross-sectional observational study involving 563 women under age 45 years seeking treatment for infertility at Montefiore Medical Center in New York or at the Yale Univer-

sity in vitro fertilization program in New Haven, Conn. Diminished ovarian reserve, defined by a baseline serum follicle-stimulating hormone level greater than 10 mIU/mL, was present in 70 subjects.

Ovarian reserve reflects the

**After adjustment for age and site, women with blood type O were twice as likely to have diminished ovarian reserve than were women with other types.**

quantity of gametes available for procreation. Dr. Nejat and his coworkers decided to look for a possible association between blood type and ovarian reserve because other than advancing age, the determinants of ovarian reserve are unclear. Other investigators have previ-

ously described a link between blood type A and ovarian hyperstimulation syndrome.

A total of 61% of women with diminished ovarian reserve were blood type O, as were 43% of those with a baseline follicle-stimulation hormone level of 10 mIU/mL. After adjustment of the results for age and site, women with blood type O were at twofold greater risk of having diminished ovarian reserve than were women with other blood types.

The A blood group antigen was present in 26% of women with diminished ovarian reserve and 41% of those with adequate ovarian reserve. The adjusted risk of diminished ovarian reserve in women possessing the A blood group antigen was half that in women with blood types O or B.

Dr. Nejat said he had no relevant financial conflicts. ■

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