Intermittent iron supplementation in women can reduce anaemia and has less side effects than daily supplementation

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**BACKGROUND:** Anaemia is a common problem in women of reproductive age and is estimated to affect ~7% of women in countries with high incomes and up to 40% in women in low to middle income countries depending on the levels of malaria, HIV and availability of clean drinking water and sanitation.1 Iron and folic acid supplementation is the recommended therapy for treating anaemia.2 However, patients tend to be non-compliant with this therapy due to the side effects experienced by taking iron supplementation.3

**CLINICAL BOTTOM LINE:** This Cochrane review showed that women who were prescribed iron supplementation for three or less non-consecutive days per week had equivalent haemoglobin levels and numbers of women continuing to be affected by anaemia as women who were prescribed daily administration of iron supplements.4 However, women with intermittent supplementation were less likely to suffer from side effects such as constipation and gastrointestinal discomfort than those on daily supplementation.4

<table>
<thead>
<tr>
<th>Outcome measured</th>
<th>Success</th>
<th>Evidence</th>
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<tbody>
<tr>
<td>Anaemia in adolescent and adult menstruating women</td>
<td>There was no evidence of a difference in numbers of women with anaemia between women who were supplementing daily with iron (23 per 100) versus those supplementing intermittently (25 per 100 (22 to 30))</td>
<td>This evidence is of moderate quality and is based on 1749 participants from eight studies.</td>
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<tr>
<td>Haemoglobin in adolescent and adult menstruating women</td>
<td>There was no evidence of a difference in haemoglobin levels between women who were supplementing daily with iron versus those supplementing intermittently with a difference between the two groups of 0.43 (95% CI 1.44 to 2.31)</td>
<td>This evidence is of low quality and is based on 2127 participants from ten studies.</td>
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<td>Adverse side effects, eg nausea, vomiting, constipation, gastrointestinal discomfort</td>
<td>Women receiving daily supplementation were much more likely to experience side effects (29 per 100) than those receiving intermittent supplementation (2 per 100 (6 to 24))</td>
<td>This evidence is of low quality and is based on 1166 participants from six studies.</td>
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References


