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ERRATUM
Néel State in the Fermionized Spin $\frac{1}{2}$ Heisenberg Antiferromagnet on Hypercubic and Triangular Lattices

[Pham Thi Thanh Nga and Nguyen Toan Thang, *Comm. Phys.* **22**(1) (2012) 33]

The equation (67) should take the following form:

$$\begin{aligned} F =& \frac{Nz\alpha Jm_o^2}{2} - \frac{N}{\beta}\ln\left(2\cosh\frac{z\alpha Jm_o\beta}{2}\right) \\ &+ \frac{1}{2\beta}\sum_{\vec{p}\in BZ}\ln\left[1 - \frac{z\alpha J\beta\gamma(\vec{p})}{4}\left(1-4m_o^2\right) + \frac{zJ\beta\left(1-\alpha^2\right)f^2(\vec{p})}{4\alpha\left(1-\gamma(\vec{p})\right)}\left(1-4m_o^2\right)\right] \\ &+ \frac{1}{\beta}\sum_{\vec{p}\in BZ}\ln\frac{\sinh\frac{\beta\varepsilon(\vec{p})}{2}}{\sinh\frac{z\alpha Jm_o\beta}{2}}. \end{aligned}$$

The notation "$\vec{p}\in BZ$" should read also for the summation over $\vec{p}$ on the Eqs. (54), (69), (70) and (72).

The sentence following the Eq. (69) of the paper should read "The numerical evaluation of the equation (69) gives $\varepsilon_o = -0.1796$, which is exactly the value obtained in linear spin wave approximation [19] and is in agreement with the results obtained by other methods [20-23]".

The equation (70) should take the following form:

$$\begin{aligned} m =& \left(m_o + \frac{1}{4m_o}\right) + \frac{z\alpha J\Delta m}{4m_o} - \frac{1}{4N}\sum_{\vec{p}\in BZ}\frac{1}{\tanh\frac{\beta\varepsilon(\vec{p})}{2}}\left(\frac{2}{\omega(\vec{p})} + \frac{\left(\frac{1}{\alpha}-1\right)\gamma(\vec{p})}{\omega(\vec{p})} + 2z\alpha J\Delta m\omega(\vec{p})\right) \\ &- \frac{4m_o zJ\Delta m}{N}\sum_{\vec{p}\in BZ}\frac{\alpha^2\gamma(\vec{p})(1-\gamma(\vec{p})) - (1-\alpha^2)f^2(\vec{p})}{4\alpha(1-\gamma(\vec{p})) - zJ\beta\left[\alpha^2\gamma(\vec{p})(1-\gamma(\vec{p})) - (1-\alpha^2)f^2(\vec{p})\right]\left(1-4m_o^2\right)}. \end{aligned}$$

The equation (71) should read:

$$\Delta m = \frac{\beta\left(1-4m_o^2\right)}{4 - \beta z\alpha J\left(1-4m_o^2\right)}.$$

The conclusions are unaltered.

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