K. Scharnhorst: *Background field method and effective action.* Harvard University Cambridge Preprint HUTP 87/A087, 32 pp..

Misprints, errata, addenda:

- P. 3, eq. (2.15), the left hand side of the equation should read correctly:

$$\Gamma_{cl}[\varphi + \bar{\varphi}] \ + \ \int dx \ J(x)\varphi(x) \ \ = \ \ \ldots$$

- P. 7, eq. (2.36), $\Pi(\tau\bar{\varphi}; z; z')$ should read correctly: $\Pi(\tau\bar{\varphi}; z, z')$.
- P. 16, eq. (5.11), $K^{ab}_{\mu\nu}(\bar{B}; \alpha; x, x')$ should read correctly: $K^{ab}_{\mu\nu}(\bar{B}; \alpha; x)$.
- P. 22, eqs. (5.42)-(5.44), $F^{b}_{\mu\mu'}(\bar{B})$ should be multiplied by a factor of g.
- P. 28, eq. (B 6), the symbol $\bar{J}^a_\mu$ should read correctly: J^a_μ.
- P. 29, eq. (B 12), the r.h.s. of the equation should read correctly:

$$\begin{aligned} \ldots \ \ = \ \ & \int d^4z \ \left\{ D^{a'b}_{\nu}\left(\bar{B} + \frac{\delta}{i\delta J'}\right)_{y'} \ \delta^{(4)}(y'-z) \right. \\ & \left. \qquad - \ i \ \bar{J}^c_\mu(z) \ g \ f^{cbe} \ \frac{\delta}{\delta J'^{\ e}_{\mu}(z)} \frac{\delta}{\delta J'^{\ a'\nu}(y')} \right\} \\ & \qquad \times \ \frac{\delta}{\delta\eta^a(y)} \frac{\delta}{\delta\bar{\eta}^b(y')} W[J', \eta, \bar{\eta}, \bar{B}]|_{\eta=\bar{\eta}=0, J'=0} \ . \end{aligned} \tag{B 12}$$

- P. 30, eq. (B 14), the r.h.s. of the equation should read correctly:

$$\begin{aligned} \ldots \ \ = \ \ & - \ \delta^{aa'} \ \delta^{(4)}(y-y') \\ & - \ iD^{a'b'\mu'}(\bar{B})_{y'} \int d^4z \ \bar{J}^c_\mu(z) \ g \ f^{cbe} \ \frac{\delta}{\delta J'^{\ e}_{\mu}(z)} \frac{\delta}{\delta J'^{\ b'\mu'}(y')} \\ & \times \ \frac{\delta}{\delta\eta^a(y)} \frac{\delta}{\delta\bar{\eta}^b(z)} W[J', \eta, \bar{\eta}, \bar{B}]|_{\eta=\bar{\eta}=0, J'=0} \end{aligned} \tag{B 14}$$

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