# Quantum Mechanics <br> Symbolism of Atomic Measurements 

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## List of typographical errors (updated April 2021)

1. On p. 1, in the last line of the 1st paragraph read "physicist" rather than "physicists".
2. On p. 29, in the footnote, Schrödinger's year of birth is 1887 , not 1889.
3. On p. 30, before (1.1.2), replace "component of force" by "component of the force".
4. On p. 64 , in (1.12.29) replace $\mathrm{e}^{\mathrm{i} \varphi}$ by $\mathrm{e}^{ \pm \mathrm{i} \varphi}$ and $\mathrm{e}^{-\mathrm{i} \varphi}$ by $\mathrm{e}^{\mp \mathrm{i} \varphi}$.

5. On p. 90, Problem 1-19 should end with a question mark.
6. On p. 95, in Problem 1-36c read "in such a way that $U$ is" rather than "in such a way the $U$ is".
7. On p. 111, in (2.3.7) replace $\mathrm{e}^{\mathrm{i}\langle q\rangle\left(p^{\prime}-\langle p\rangle\right)}$ by $\mathrm{e}^{-\mathrm{i}\langle q\rangle\left(p^{\prime}-\langle p\rangle\right)}$.
8. On p. 120, in (2.5.16) replace the left-hand side by $0=\left(\frac{\mathrm{d}^{2}}{\mathrm{~d} q^{\prime 2}}-{q^{\prime}}^{2}+2 n+1\right) \mathrm{e}^{-\frac{1}{2} q^{\prime 2}} \mathrm{H}_{n}\left(q^{\prime}\right)$.
9. On p. 122, in (2.5.37) replace $\sum_{l \neq q}$ by $\sum_{l \neq k}$.
10. On p. 124, in (2.6.12) read $\left(y^{\dagger}\right)^{k} y^{k}$ rather than $\left(y^{\dagger}\right)^{n} y^{n}$.
11. On p. 129, first line in (2.7.33), replace $\left\langle y^{\dagger} \mid y^{\prime \prime}\right\rangle$ by $\left\langle y^{\dagger^{\prime}} \mid y^{\prime \prime}\right\rangle$.
12. On p. 129, last line in (2.7.33), replace $\left\langle\left. y^{\dagger}\right|^{\prime} y^{\prime \prime}\right\rangle$ by $\left\langle y^{\dagger^{\prime}} \mid y^{\prime \prime}\right\rangle$.
13. On p. 140, in Problem 2-14, replace $\frac{1}{2}|\mathrm{i}[A, B]|$ by $\frac{1}{2}|\langle\mathrm{i}[A, B]\rangle|$.
14. On p. 141, in Problem 2-17a, replace $\left(\frac{1}{2}(\bar{q} \bar{p}+\bar{p} \bar{q})\right.$ by $\left(\frac{1}{2}(\bar{q} \overline{\bar{p}}+\overline{\bar{p}} \overline{\bar{q}})\right.$ in the last displayed equation.
15. On p. 142, in Problem 2-19a replace $\mathrm{H}(q)$ by $\mathrm{H}_{n}(q)$.
16. On p. 155, in (3.4.2) replace $j=\frac{1}{2}\left(n_{+}+n_{-}\right)=n$ by $j=\frac{1}{2}\left(n_{+}+n_{-}\right)=\frac{1}{2} n$.
17. On p. 155 , in the second line of (3.4.3) replace $\left|n_{+}-1, n_{+}+1\right\rangle$ by $\left|n_{+}-1, n_{-}+1\right\rangle$.
18. On p. 159, in the unnumbered equation read $|j, m-1\rangle$ rather than $|j, m\rangle$.
19. On p. 165, between (3.6.10) and (3.6.11) replace $\langle a|$ by $\left\langle a^{\prime}\right|$.
20. On p. 171, in (3.7.22), replace $U_{-1,1}^{(1)}=\sin ^{2} \theta$ by $U_{-1,1}^{(1)}=\sin ^{2} \frac{\theta}{2}$.
21. On p. 178, in Problem 3-8a, the displayed equation should read 3-2 $\boldsymbol{\sigma}_{1} \cdot \boldsymbol{\sigma}_{2}$ rather than $3-\sigma_{1} \cdot \sigma_{2}$.
22. On p. 179, in Problem 3-9, 2nd line, read "sometimes called" rather than "sometimes call".
23. On p. 209, in (5.5.14) read $\int_{t_{2}}^{t_{1}}$ rather than $\int_{t_{1}}^{t_{2}}$.
24. On p. 230, in (6.3.9) read $p_{x}=\sqrt{M \hbar \omega} p$ rather than $p_{x}=\sqrt{m \hbar \omega} p$.
25. On p. 240, in (6.7.8) replace $\frac{1}{3} \sigma^{3}$ by $\frac{1}{3} \tau^{3}$ in the exponent.
26. On p. 269, in the 2 nd line after (7.1.2) read $0, \omega, 2 \omega$ rather than $\omega, 2 \omega, 3 \omega$.
27. On p. 289, in (7.4.14) read $(1 \pm \mathrm{i} \delta \alpha) y_{ \pm}$rather than $\left(1 \pm \mathrm{i} \delta \alpha y_{ \pm}\right)$.
28. On p. 296, in the first line of (7.5.8) read $\boldsymbol{L}^{2} \rightarrow-(\boldsymbol{q} \times \boldsymbol{\nabla}) \cdot(\boldsymbol{q} \times \boldsymbol{\nabla})$ rather than $\boldsymbol{L}^{2} \rightarrow-(\boldsymbol{q} \times \boldsymbol{\nabla}) \times(\boldsymbol{q} \times \boldsymbol{\nabla})$.
29. On p. 298, in (7.5.26) replace $\mathrm{L}_{n_{\rho}}^{\left(l+\frac{1}{2}\right)}(\rho)$ by $\mathrm{L}_{n_{\rho}}^{\left(l+\frac{1}{2}\right)}\left(\rho^{2}\right)$.
30. On p. 347, before (9.2.6) read $\mathrm{i}^{l} \mathrm{P}_{l}(\zeta)$ rather than $\mathrm{i}^{l} \mathrm{P}(\zeta)$.
31. On p. 380, in the second and the third line of (10.1.41), replace $\mathrm{e}^{\mathrm{i} \varphi\left(a^{\prime}\right)+\mathrm{i} \varphi\left(a^{\prime \prime}\right) N}$ by $\mathrm{e}^{\mathrm{i} \varphi\left(a^{\prime}\right) N+\mathrm{i} \varphi\left(a^{\prime \prime}\right) N}$.
32. On p. 393, in (10.6.10) replace $\psi\left(y^{\prime} t\right)$ by $\psi\left(a^{\prime}, t\right) ; 2$ occurrences.
33. On p. 414, in (11.2.35) replace $\frac{1}{4 \pi^{2} e^{2}}$ by $\frac{1}{4 \pi e^{2}}$.
34. On p. 415, replace the text below the plot by "shows that $f=0$ occurs at finite $x$, where $-f^{\prime} \neq 0$, if $-f^{\prime}(0)>B$; and $f^{\prime}=0$ occurs at finite $x$, where $f \neq 0$, if $-f^{\prime}(0)<B$."
35. On p. 417, in the second line of (11.2.46), replace $-f(0)$ by $-f^{\prime}(0)$.
36. On p. 417, in the 1st line of (11.2.50) read ) $\boldsymbol{\nabla} \frac{1}{r}$ rather than $) \nabla \frac{1}{r}$.
37. On p. 419, in the 2 nd line after (11.2.61) read $\alpha=\frac{7}{5}$ rather than $a=\frac{7}{5}$.
38. On p. 419, in (11.2.62), replace $\frac{3}{7} \frac{B}{a / a_{0}} B Z^{\frac{7}{3}} \frac{e^{2}}{a_{0}}$ by $\frac{3}{7} \frac{B}{a / a_{0}} Z^{\frac{7}{3}} \frac{e^{2}}{a_{0}}$.
39. On p. 421, in the 4 th line after (11.3.6) $\mathrm{read}-\mathcal{E} \gg Z^{\frac{5}{3}} e^{2} / a_{0}$ rather than $\mathcal{E} \gg Z^{\frac{5}{3}} e^{2} / a_{0}$.
40. On p. 462, in (12.9.3), replace $\left\langle E_{0}\right| \delta H_{1}\left|E_{0}\right\rangle$ by $\left\langle E_{0}\right| \delta H_{2}\left|E_{0}\right\rangle$.
41. On p. 463, in (12.9.12) replace $\langle E, \ldots|$ by $\left\langle E_{0}\right|$.
