Errata for “Partial Differential Equations”, AMS Press
by Lawrence C. Evans

These correct mistakes present in the second printing of the second edition. Owing to the pandemic, I have been late in posting the latest corrections.

Last modified: May 13, 2024.

CHAPTER 1
page 2, line -13: Add “Let $k$ be a positive integer.”
page 3, line -1: Change to “$u_t + \sum_{i=1}^{n}(b'u)_x = 0.$”

CHAPTER 2

CHAPTER 3
page 125, line 9: Change to “proof of Lemma 2”
page 132, line 5: Change “C.4” to “C.5”
page 150, line 10: Change “C.4” to “C.5”
page 151, line -7: Change to “$v_{xx}$”
page 156, line 6: Add “Assume $L = F^*$ is smooth and uniformly convex.”
page 162, line -8: Add “where $\cdot = \frac{d}{ds}.$”
page 162, Problem 6(b). This should say:
Show that $u(x,t) = g(x(0,x,t))J(0,x,t)$ solves

$$
\begin{align*}
    u_t + \text{div}(u\mathbf{b}) &= 0 \\
    u &= g.
\end{align*}
$$

CHAPTER 4
page 195, line 1: Change to “$h, g, Dg \in L^2$”

CHAPTER 5
page 266, line 17: Change “C.4” to “C.5”

CHAPTER 6
CHAPTER 7
page 449, line -5: Change $U_T$ to $U \times (0, \infty)$.

CHAPTER 8
page 473, line -7: Change to “... is unique, provided $I[u] < \infty$.”
page 478, line 3: Change to “... is unique, provided $I[u] < \infty$.”
page 515, line 12: Change $DL_p$ to $D_pL$.
page 528, line 12 Change to “349-381”

CHAPTER 9
page 544, line -9: Should be “= $-\lambda b(Du)$”

CHAPTER 10
To avoid notational confusion, make the following changes in the proof of Theorem 3:
page 603, line -5: Change to “$x = x_0 - hw$”
page 603, line -4: Change v to w
page 603, line -3 Change to “$x_0 - hw$” and “$L(w)$”
page 603, line -1 Change to “$Dv(x_0, t_0) \cdot w - L(w)$”
page 604, line 1 Change v to w
page 604, line 4: Change v to w
page 604, line -11: Change to “$x_1 = x_1(h)$”

CHAPTER 11

CHAPTER 12

APPENDICES, INDEX, REFERENCES
page 711, line 6: Change “nonnegative” to “nonnegative definite”
page 740, line 20: Should be “Temam”


Please let me know about any other errors you find, at evans@math.berkeley.edu.