Corrections over Second Impression, 2007

page	location	text appearing	correction
85	lines 21 and 22	$\mathcal{Q}_k^T \mathbf{A}_k \cdots$	$\mathcal{Q}_k^T \mathbf{A} \cdots$
86	line 4	$\mathcal{Q}_k^T \mathbf{A}_k \mathbf{q}_2$	$\mathcal{Q}_k^T \mathbf{A} \mathbf{q}_2$
106	line 16	superposition	superimposition
107	line 10	consititute	constitute
113	line 6	$(\mathbf{a}, \mathbf{b})$	$\|(\mathbf{a}, \mathbf{b})\|$
162	line 14-15	a finitely many	finitely many
178	line 11	Superpose	Superimpose
190	line 17	$\mathbf{d}_i^T \mathbf{d}_j = 0$	$\mathbf{d}_i^T \mathbf{g}_j = 0$
217	line 24	$\frac{1}{2}\mathbf{c}^T \mathbf{c}$	$\frac{1}{2}\mathbf{c}^T \mathbf{Q}^{-1} \mathbf{c}$
290	line 10	superposition	superimposition
303	line 6 from bottom	$D_t \equiv \left(\frac{d}{dt} - 1\right)$	$D_t \equiv \frac{d}{dt}$
335	Table 39.1	$y'' + xy = 0$ $(1-x^2)y'' - xy + k^2 y = 0$	$y'' \pm k^2 xy = 0$ $(1-x^2)y'' - xy' + k^2 y = 0$
338	line 2 Fig. 39.2	a_m Annotations $J_0(x)$ and $J_1(x)$	a_{2m} [to be interchanged]
339	line 6 from bottom	$(1-x^2)y'' - xy + k^2 y = 0$	$(1-x^2)y'' - xy' + k^2 y = 0$
341	lines 7-8	a non-trivial solution, and what is the corresponding solution (eigenfunction), up to an arbitrary scalar multiple?	non-trivial solutions, and what are the corresponding solutions (eigenfunctions), up to arbitrary scalar multiples?
349	line 1 from bottom	$\phi_k,\ k = 1, 2, \cdots$	$\phi_n,\ n = 1, 2, \cdots$
357	line 4 line 6	$\int_0^\infty A(p) \cos px\, dx$ $\int_0^\infty B(p) \sin px\, dx$	$\int_0^\infty A(p) \cos px\, dp$ $\int_0^\infty B(p) \sin px\, dp$
360	line 12	$K(s, x) = e^{-st}$	$K(s, t) = e^{-st}$
365	line 7 from bottom	superpose	superimpose
370	line 23 lines 33, 38 lines 34, 39	$f(x)$, -1, m, n l, 1	$f(x)$ over $[a, b]$, a, m, n l, b

386	line 18	$T'' + \lambda^2 T = 0$	$T'' + c^2\lambda^2 T = 0$
	lines 19 and 22	$A_{mn}\cos\lambda_{mn}t + B_{mn}\sin\lambda_{mn}t$	$A_{mn}\cos c\lambda_{mn}t + B_{mn}\sin c\lambda_{mn}t$
	line 25	$B_{mn}\lambda_{mn}$	$c\lambda_{mn}B_{mn}$
391	line 2 from bottom	at	with
392	line 1	at	with
410	line 14	$\frac{(m+n)!}{(n+1)!}\sum_{n=-1}^{\infty} a_n(z-z_0)^{n+1}$	$\sum_{n=-1}^{\infty}\frac{(m+n)!}{(n+1)!}a_n(z-z_0)^{n+1}$
417	line 22	presecribed	prescribed
427	line 18	$\lambda_1 = \min\int_a^b [r(x)y_1'^2 - q(x)y_1^2]dx$	$\lambda_1 = \int_a^b [r(x)y_1'^2 - q(x)y_1^2]dx$
466	line 18	As cosequences,	As a consequence,
474	lines 4 and 9	$\begin{bmatrix} \sqrt{\gamma(\beta-1)} \\ \sqrt{\gamma(\beta-1)} \\ \beta-1 \end{bmatrix}$	$\begin{bmatrix} \pm\sqrt{\gamma(\beta-1)} \\ \pm\sqrt{\gamma(\beta-1)} \\ \beta-1 \end{bmatrix}$
	line 9	$\begin{bmatrix} \alpha(z_2-z_1) \\ z_1-z_2-\sqrt{\gamma(\beta-1)}z_3 \\ \sqrt{\gamma(\beta-1)}(z_1+z_2)-\gamma z_3 \end{bmatrix}$	$\begin{bmatrix} \alpha(z_2-z_1) \\ z_1-z_2-\mp\sqrt{\gamma(\beta-1)}z_3 \\ \pm\sqrt{\gamma(\beta-1)}(z_1+z_2)-\gamma z_3 \end{bmatrix}$
479	line 15	superposed	superimposed
	line 7 from bottom	$(t+1)\mathrm{Si}\frac{(t+1)\pi}{2} + (t+1)\mathrm{Si}\frac{(t+1)\pi}{2}$	$(t+1)\mathrm{Si}\frac{(t+1)\pi}{2} + (t-1)\mathrm{Si}\frac{(t-1)\pi}{2}$
482	line 11	$\frac{\cos px\cos pt}{1+p^2}$	$\frac{\cos px\cos cpt}{1+p^2}$
483	line 4	$32n$	$16n$
484	line 14	$u_r(r,0) = g(r)$	$u_t(r,0) = g(r)$
485	line 2	negative real axis (i.e. $\theta = \pm\pi$).	negative real axis (i.e. $\theta = \pm\pi$), including the origin ($r = 0$).
	line 3	$w(z) = ize^{-z} + c$.	$w(z) = i(ze^{-z} + c)$.
	line 1 from bottom	$\nabla^2\phi = 0$ and $\nabla^2\psi = 0$.	$\phi(x,y)$ and $\psi(x,y)$ are harmonic functions satisfying Cauchy-Riemann conditions in z-plane as well.
486	line 1	$\psi(x,y) + Uy(3x^2 - y^2)$	$\psi(x,y) = Uy(3x^2 - y^2)$
488	line 8	pont	point
	line 12	$f(z) = \frac{g(z)}{(z-z_0)^p}$, where $g(z)$ is	$f(z) = \frac{h(z)}{(z-z_0)^p}$, where $h(z)$ is
	line 1 from bottom	Boundary conditions $\delta x = \delta y = \delta\dot{x} = \delta\dot{y} = 0$ lead to	Use boundary conditions $\delta x = \delta y = 0$ to evaluate
489	line 4	$x = \frac{k}{2}(\theta - \sin\theta)$	$x = \frac{k}{2}(\theta - \sin\theta) + a$