ERRORS IN GALACTIC ASTRONOMY (September 24, 2002)

We are very grateful to colleagues for reporting errors to us – we are especially indebted to Roland van der Marel and Bodil Helt for extensive corrigenda. Some corrected pages are downloadable by anon ftp to jjb.physics.ox.ac.uk followed by

cd bm
get reprint0.ps.gz
....
get reprint6.ps.gz

I: ERRORS CORRECTED AT FIRST REPRINTING

p.43 : eq. (2.17): numerator and denominator on the r.h.s. should be reversed.

p.78, l.4 : *to* distinguish

p.88, l.3 : pulsars *pulse*

p.100, l.-5 (i.e., line 5 from the bottom): $z \to$ metallicity Z

p.107, Table 3.10, heading: delete "giants: luminosity and colors"

p.135, Fig. 3.17: labels don't reflect that both axes are logarithmic

p.158 & 159, l.-2: within *of* cluster galaxies

p.166, l.14: luminosity function*s*

p.175, l.7: period missing

p.183, l.6: in $I(\mathbf{R})$, the R should be boldface, not underscored.

p.199, l.19: .05 $\to$ .005

p.200 & 201, l.-5: *by* examination

p.200, Fig 4.38: interchange left and right panels

p.216, l.5: 3893 $\to$ 3898

p.237, Fig. 4.63: in left pane all plot symbols should be same type

p.240, 241, l.1: *to of*

p.247 l.-5: the random the motions

p.264, Fig. 5.1: position of RC added (all others lines from Table 5.1 are also indicated).

p.273, Fig. 5.7: label along x-axis fails to indicate that the scale is logarithmic.

p.280, l.-4: A *stars*

p.292, l.-3: *there* is no

p.345, l.1: for a for a

p.401, l.13: $\Delta R \to \Delta r$

p.416, p.-17: the number of stars $\to$ the number of globular clusters p.456, l.10: the width *of* the Ly ...

p.466, eq (1) in box: the penultimate line should end $L = 0 \not\to L = 0$

p.475, Table 8.1, Notes: in the last line, $10^6 \to 10^{-6}$

p.486, l.-9: heat a photon → heat a grain

p.514, l.-5: dust in early-type galaxies dust

p.517, Fig.8.43, caption, last line: falls → rises

p.529, l.-8: much this of tail

p.538, Fig 9.3: there should be no emission at $l > 90$ and $v > 0$ or at $l < -90$ and $v < 0$

p.573, l.-16: add "was sensitive" after COBE

p.607, l.12: have allow*ed* us

p.608, l.14: the kinds *of* data

p.608, l.17: to examine of the bulge

p.609, l.2: delete "Galactic center: extinction to"

p.622, l.-9: at its red end → at its blue end

p.623, l.-12: Seventer → Sevenster

p.644, l.4: expected *to* decrease

p.663, l.-2: the amount *of*

p.670, Fig.10.32: wrong figure shown

p.678, l.3&4: delete this para

p.711, l.-12: kurtotic → kurtosis

p.719, Fig 11.13, Caption: CFHT resolution should be 0.5".

II: ERRORS in SECOND PRINTING

p.10, l-6 : Hoskins → Hoskin

p.15, l+1 : late 1923 → late 1922

p.18, l-5 : galactic bar → Galactic bar

p.31, below eq (2.1): longitude of NCP is $l_{\rm CP} = 122.932$ not 123.932 as given

p.61, l+18 : that the this galaxy → that this galaxy

p.65, Eq (2.54): replace $\theta_{\rm E}$ by $\theta_{\rm E}^2$

p.80 Eq (3.11): replace $(v_{r1} + v_{r2})^2$ by $(v_{r1} + v_{r2})^3$

p.87, l-8 : periods of the of the best → periods of the best

p.111, l+17 : the number $\mathrm{d}N/\mathrm{d}m$ of → the number $\mathrm{d}N$ of p.115, l+13 : $0.15 \to -0.35$

p.147, note : the "Shapley-Ames → the "Revised Shapley-Ames

p.164, Eq (4.4) and on line below: replace Φ_0 by Φ^*

p.177, Eq (4.7): $P(d) \to P(\mathbf{d})$

p.177, Eq (4.8): Integrand missing factor

$$\frac{1}{\sigma^2}\exp\Big(-\frac{R^2+R'^2}{2\sigma^2}\Big)$$

p.178, l+1 : length a their → length a of their

p.185, last line: replace $x - yR^{1/4}$ by $x + yR^{1/4}$

p.237, l+4: add '+4' before 'being'

p.255, Eq in Problem 4.1 missing factor $1/\pi\sigma^2$ before integral and limits of θ' integral should be $0, \pi$.

p.256 In last line of Problem 4.5, replace $I \sim R^{-(1+\alpha)}$. by $I \sim R^{-(\alpha-1)}$.

p.277, l-5 'lower' to 'higher'

p.287, Last line of (5.16): replace by $\mathcal{M}^{-1.83}$ for $0.2\,\mathrm{M}_\odot < \mathcal{M} < 1\,\mathrm{M}_\odot$

p.297, Fig 5.15 : The β-decay arrows should point diagonally

p.308, l 15,16: change x to 0.2 and 0.51 to 0.52

p. 311 eq (5.48) change 0.6 to 6

p. 312 l 5: change 0.6 to 6

p. 316 eq (5.66): $\mathrm{d}M_{\mathrm{GB}}$ to $\mathrm{d}\ln M_{\mathrm{GB}}$

p. 322 l-2: (5.72) to (5.71)

p. 324 l 18: 'lower-frequency' to 'higher-frequency'

p. 325 Prob 5.8 SF rate $\propto \mathrm{e}^{-\alpha t}$ and delete t in numerator of (5.73) so it reads

$$\Phi_0(M) = \frac{\alpha \mathrm{e}^{t\alpha}}{\mathrm{e}^{\tau_{\mathrm{MS}}\alpha} - 1}\Phi(M).$$

p. 338 l-12 to end para: replace with "Since RR Lyrae period decreases monotonically with the star's metallicity, this gap also shows up as a minimum in the period distribution; clusters on the metal-rich side of the gap form a group whose RR Lyrae stars have short periods, while those on the metal-poor side of the gap contain only long-period RR Lyrae stars."

p 354 l 1: change "second" to "third"

p 371 l 12: change r to R

p 371 l -4: change "spectra" to "measurements" p 372 l -13: replace “an isotropic system” with “a system with an isotropic velocity distribution”

p. 537: caption Fig 9.2: change r to R

pp. 538, 539 captions of Figs 9.3 & 9.4: change 20° to 15° and also in text

pp 539,540: in many places change r to R

p. 542 caption of Fig 9.7: reverse ‘clockwise’ & ‘anticlockwise’ in the last sentence.

p. 548 l 2 and caption Fig 9.12: change 20° to 15°; also change (8.16) to (8.18)

p. 557 l19: add ‘used’ after ‘been’

p. 611 eq (10.3) second line: change πs_b to $\pi q_b s_b$

p. 612 eq (10.4) change first $2z_0$ to $4z_0$

p. 627 l 9 and 11: change $V_\odot$ to $W_\odot$

p. 631 l-2 of Box 10.2: change $(q\sin\psi, \cos\psi)$ to $(\cos\psi, q\sin\psi)$

p. 639 eq (10.22): remove $\frac{R_0}{R}$; in last line of eq (10.27) add $(R-R_0)$ before $\frac{\mathrm{d}\Omega_z}{\mathrm{d}R}$

p. 640 eq (10.29): remove subscript z from Ω

p. 642 l 10: §2.1.5 to §2.1.6

p. 659 l -7: ‘density is K/D’ to ‘density is $K/(2D)$’; eq (10.53) add minus sign after second equality

p. 668 eq (10.63) and in line above: add hats to $\mathbf{x}^{(i)}$

p. 669 eq (10.64): replace top of fraction by $\sum_i \left(v_{\rm los}^{(i)} + \mathbf{v}_\odot \cdot \hat{\mathbf{x}}^{(i)}\right)\mathbf{e}_\phi^{(i)} \cdot \hat{\mathbf{x}}^{(i)}$

p. 673 l-17: change [Fe/H]$\lesssim -0.8$ to [Fe/H]$\gtrsim -0.8$

p. 674 l 12: change $\mu_0 d$ to $\mu_0 s$

p. 675 last line: change $\frac{1}{3}u^3/\mu_0^3$ to $\pi u^3/(16\mu_0^3)$ and change rhs of eq (10.68) to

$$\frac{\pi^2 n_0}{4\mu_0^3} u^3 f(u)$$

p. 678 caption Fig 10.37: replace $y_{\rm eff} = 0.025$ by $p/(1+c) = 0.025Z_\odot$

p.680, 3 lines above (10.73): after ‘by’ replace rest of paragraph with ‘equations (10.73) below with $q = 0.6$, $\beta = \gamma = 1.8$, and $r_t = 1.9\,$kpc.’

p. 681 l -4: change “0.2” to “2”

p.745, Arias : voordinate → coordinate

p.758, Hoskins: Hoskins → Hoskin