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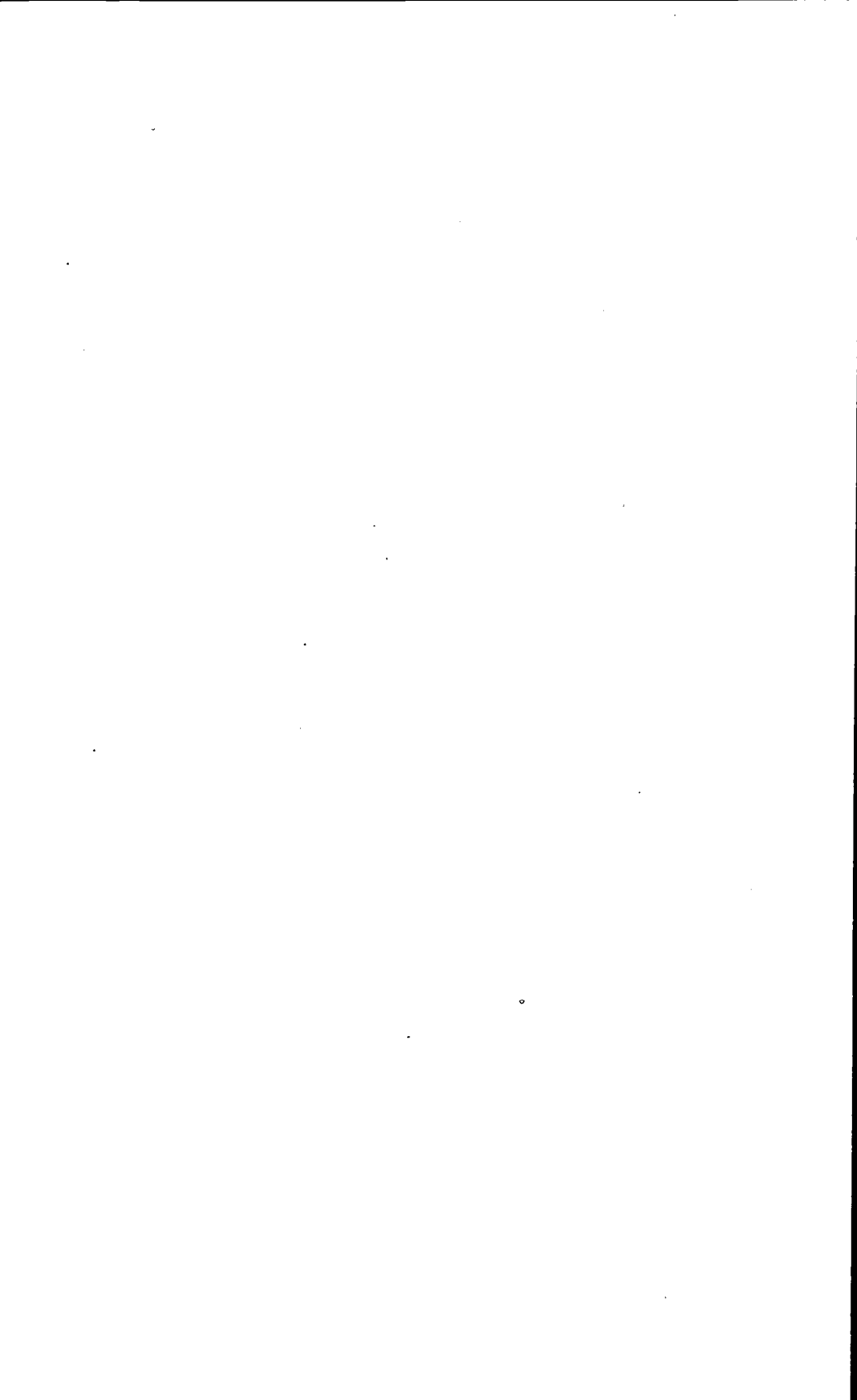Chapter Title: Appendices to "International Migrations, Volume II:
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# APPENDICES

# APPENDIX I

# PREVIOUS ESTIMATES OF THE WORLD'S POPULATION

## TABLE I.

### Previous Estimates of the World's Population, 1650–1850.

Five predecessors have assembled estimates of the population of the earth made at various dates. The series began with Balbi, whose figures spoke for 1826 but were not published until several years later, included Wappäus (1855), Wagner (1874), Levasseur (1887 and 1889), and ended with Knibbs (1917). Of these the most important are Balbi and Wagner: the former broke ground in this matter and cited many more sources than any successor except Knibbs who simply brought together the earlier results; Wagner gave most attention to the subject, combining his collection of estimates with an historical sketch of similar attempts, wherein he displayed keen critical insight. He showed that the estimates should be arranged not by size as Balbi and Wappäus had done, but by date and then fell into families or groups.

In the following Table I the results of these five writers for dates before 1850 are brought together and arranged chronologically. All previous writers but one wrote in France or Germany, and he made no additions of his own; consequently the new contributions numbering 23 have been drawn for the most part from English sources. As Balbi gave no fuller citation than the last name of the author, several of his sources could not be found after search in American libraries and in those of Paris where he wrote. *These unverified citations are printed in italics*; several of them are probably erroneous. This list stops with 1850 because the annual estimates published in *Hübner's Tabellen* are available after that year (see Table II). The material on which these two tables have been based has been deposited with the Library of Congress.

## TABLE I
### Estimates of the Population of the Earth and of the Continents, made between A.D. 1650 and 1850.
### (In Millions)

| Date | Source | Compiler[1] | Earth | Europe | Asia | Africa | America | Oceanica |
|---|---|---|---|---|---|---|---|---|
| 1661 | Riccioli[2] | 1 | 1000 | 100 | 500 | 100 | 200 | 100 |
| 1682 | Petty[3] | 6 | 320 | | | | | |
| 1685 | Vossius[4] | 1 | 500 | 30 | 300 | | | |
| 1696 | King[5] | 6 | 700 | 100 | 340 | 95 | 65 | 100 |
| 1696 | Nicholls[6] | 6 | 960 | | | | | |
| 1702 | Whiston[7] | 6 | 4000 | | | | | |
| *1735* | *Le Gendre[8]* | *1* | *900* | | | | *150* | |
| 1737 | Univ. History[9] | 1 | 4000 | | | | | |
| 1737 | Canz[10] | 1 | 60 | 10 | 20 | | | |
| 1740 | Struyck[11] | 1 | 500 | 100 | 250 | 100 | 50 | |
| 1741–2 | Süssmilch[12] | 2 | 950–1000 | 150 | 500 | 150 | 150 | |
| 1753 | Wallace[13] | 1 | 1000 | | | | | |
| 1760 | Bielfeld[14] | 1 | 950–1000 | 150 | 500 | 150 | 150 | |
| 1761 | Süssmilch[15] | 1 | 1080 | 130 | 650 | 150 | 150 | |
| 1762 | Büsching[16] | 6 | 1000 | 150 | | | | |
| 1763 | Voltaire[17] | 3 | 900 | | | | | |
| *1771* | *Beausobre[18]* | *1* | *1110* | *160* | *650* | *150* | *150* | |
| 1778 | Moheau[19] | 6 | 950 | 150 | 500 | 150 | 150 | |
| 1786 | Fabri[20] | 6 | 1000 | 170 | | | | |
| *1788* | Black[21] | 3 | 800 | 110 | 500 | 170 | 20 | |
| 1796 | Morse[22] | 6 | 731 | | | | | |
| 1803 | Volney[23] | 1 | 437 | 142 | 240 | 30 | 20 | 5 |
| 1804 | Pinkerton[24] | 2 | 700 | 150 | 500 | 30 | 20 | 0.5 |
| *1805* | *Fabri[25]* | *1* | *700* | | | *90* | *24* | |
| 1807 | Galletti[26] | 6 | 865 | 182 | 491 | 160 | 20 | 12 |
| 1809 | Hassel[27] | 3 | 682 | 180 | 380 | 99 | 21 | 2 |
| 1810 | Alm. de Gotha[28] | 4 | 682 | 180 | 380 | 99 | 21 | 2 |
| 1810 | Malte-Brun[29] | 1 | 640 | 170 | 360 | 70 | 40 | |
| 1811 | Pinkerton[30] | 6 | 600.5 | 150 | 400 | 30 | 20 | 0.5 |
| *1812* | *Morse[31]* | *1* | *766* | *180* | *500* | *50* | *35* | |
| 1813 | *Graberg de Hemsö[32]* | *1* | *686* | *180* | *366* | *99* | *24* | *17* |
| 1817 | Worcester[33] | 6 | 650 | 184 | 380 | 50 | 35 | 2 |
| 1817 | Thomson[34] | 6 | 700 | 180 | 400 | 80 | 40 | |
| *1818* | *Directors of missionary society[8]* | *1* | *1000* | | | | | |
| 1819 | {Gaspari Hassel Cannabich}[35] | 6 | 1000 | | | | 35.5 | |
| *1821* | *Cannabich[8]* | *1* | *700–912* | | | | | |
| 1821 | Goldsmith[36] | 6 | 1000 | 270 | 600 | 70 | 58 | 2 |
| 1822 | Worcester[37] | 1 | 718 | | | | | |
| *1822* | *Reichard[8]* | *1* | *732* | | | | | |
| *1822* | *Bissinger[8]* | *1* | *700–900* | | | | | |
| *1824* | *Hassel[8]* | *1* | *938* | *207* | *586* | *104* | *38.2* | *2.6* |
| *1824* | *Letronne[8]* | *1* | *900* | | | | | |
| *1825* | *Letronne[38]* | *6* | *900* | *200* | *550* | *80* | *50* | *20* |
| *1825* | *Stein[8]* | *1* | *885* | | | | | |
| *1827* | *Pinkerton[8]* | *1* | *710* | | | | | |
| *1827* | *Brockhaus[8]* | *1* | *800–1000* | | | | | |
| *1828* | *Denaix[8] (after Hassel)* | *1* | *951* | | | | | |
| 1828 | Meissas and Michelot[39] | 6 | 900 | | | | | |
| *1828* | *Hassel[8]* | *1* | *847* | *211* | *449* | *109* | *38.4* | *2.8* |
| *1828* | *Bergius[8]* | *1* | *893* | *223* | *521* | *107* | *40.5* | *2.5* |
| *1828* | *Balbi[8]* | *1* | *737* | *228* | *390* | *60* | *39* | *20* |
| 1828 | Alm. de Gotha[40] | 6 | 838 | 210 | 482 | 106 | 37 | 3 |
| 1829 | Letronne[38] | 6 | 900 | 200 | 550 | 80 | 50 | 20 |
| 1829 | Oriental Herald[41] | 6 | 583 | 205 | 373 | 62 | 35 | 8 |
| 1829 | Alm. de Gotha[42] | 6 | 847 | 214 | 481 | 109 | 40 | 3 |
| *1829* | *Villerme[3]* | *1* | *737* | | | | | |
| 1833 | Brockhaus[43] | 6 | 800–1000 | | | | | |
| 1835 | Bradford[44] (after Balbi) | 6 | 740 | 230 | 390 | 60 | 40 | 20 |
| 1838 | de Rougemont[45] | 2 | 850 | 235–240 | 425 | 120 | | |
| *1838* | *Franzl[46]* | *6* | *950* | *233* | *540* | *124* | *49* | *4* |
| 1840 | Omalius d'Halloy[47] | 2 | 750 | | | | | |
| *1840* | *von Roon[8]* | *2* | *864* | *237* | *454* | *122* | *49* | *2* |
| 1841 | Bernoulli[48] | 6 | 764 | | | | | |
| *1842* | *Berghaus[8]* | *2* | *1272* | *296* | *652* | *275* | *47* | *2* |
| 1843 | Balbi[49] | 6 | 739 | 229 | 390 | 60 | 39 | 20 |
| *1845* | *Meissas and Michelot[8]* | *4* | *1009* | | | | | |

*Notes to Table I.*

[1]In the column headed "compiler" the numbers refer to the earliest compiler who mentioned the estimate. The compilers arranged in chronological order are:
1. Adrian Balbi, *Abrégé de Géographie* (1833) page 46.
2. J. W. Wappäus in Stein und Hörschelmann's *Handbuch der Geog. u. Stat.*, 7th ed. (1855), vol. I, pp. 171 ff.
3. Hermann Wagner in *Die Bevölkerung der Erde*, II, (1874) page 5.
4. Emile Levasseur in *Intern. Stat. Institute Bulletin*, vol. II (1887) page 238.
Emile Levasseur in *La Population Francaise*, vol. I (1889) page 461 footnote.
5. G. H. Knibbs *in Census of Australia, 1911*, Appendix A: "Mathematical Theory of Population" (1917) pages 30-31.
6. W. F. Willcox in the present table (1930).

[2]J. B. Riccioli in *Geographiae et Hydrographiae Reformatae, Libri Duodecim*, Bologna 1661; Venice 1672. Appendix "De Verisimili Hominum Numero", pages 630-634.

[3]W. Petty in C. H. Hull, *The Economic Writings of Sir William Petty*, pages 463 (1682) and 476, footnote (1681).

[4]I. Vossius in *Variarum Observationum Liber* (1685), page 74-68.

[5]G. King in "Natural and Political Observations and Conclusions upon the State and Condition of England, 1696".

[6]W. Nicholls in *Conference with a Theist* (1696) vol. I, pages 73 ff.

[7]W. Whiston, *Short View of the Chronology of the Old Testament* (1702), page 65.

[8]Estimates printed *in italics* have not been verified.

[9]*Universal History from the Earliest Account of Time*, (1737), vol. I, page 160. This is merely a reproduction of Whiston's conjecture of 1702.

[10]Th. Canz in *De Regimine Dei Universali* (1737), p. 194, par. 294.

[11]N. Struyck in *Inleiding Tot De Algemeene Geographie* (1740). My MS copy does not give the pages.

[12]J. P. Süssmilch in *Die Göttliche Ordnung* (1742), page 97. The first edition, 1741, is very scarce; that of 1742, probably an exact reproduction, is more common. There is one in the library of the Surgeon-General at Washington and another in the library of Columbia University.

[13]Robert Wallace in *Dissertation on the Numbers of Mankind* (1753).

[14]J. F. Bielfeld in *Institutions Politiques* (1760) vol. II, page 308. This is merely a reproduction of Süssmilch's estimate of 1741.

[15]J. P. Süssmilch in *Die Göttliche Ordnung* (2d Ed. 1761-2), vol. II, page 233.

[16]Anton F. Büsching in *Neue Erdbeschreibung* (trans. 1762), vol. I, page 47. I have not seen the original, the publication of which began in 1754.

[17]Voltaire in *Oeuvres*, vol. 24, page 581. The statement of Balbi followed by Wappäus and Knibbs that Voltaire made an estimate of 1600 million is probably incorrect.

[18]Louis de Beausobre, *Introduction Générale à l'Etude de la Politique* (1765) vol. II, page 443, gives Europe 159 million. Balbi's reference dated 1771 and giving 1,110,000 as population of the earth, is perhaps to the Berlin edition of that date which has not been seen. There seems to be no estimate for the earth as a whole in the Amsterdam edition of 1765.

[19]Moheau in *Recherches et Considerations sur La Population de la France* (1778) pages 61 ff. His figures are borrowed from Süssmilch, edition of 1742.

[20]J. E. Fabri, *Geographie für alle Stande* (Leipsic 1786) pages 267 and 356.

[21]William Black, *Comparative View of the Mortality of the Human Species* (London 1788) page XV.

[22]Jedidiah Morse, *Geography Made Easy* (1796), page 413.

[23]C. F. Volney, *Tableau du Climat et du Sol des Etats-Unis d'Amerique* (Paris 1803) footnote pages 474f. American translation 1804, pages 391-3, footnote.

[24]John Pinkerton, *Modern Geography* (Phila. 1804), vol. I, page 3.

[25]Fabri's figures for Africa and America will be found in Worcester's *Geographical Dictionary or Universal Gazetteer* (1817), vol. II, end.

[26]Johann G. A. Galletti, *Allgemeine Weltkunde* (Leipsic 1807), page 2.

[27]G. Hassel, *Statistische Uebersichtstabellen* (Göttingen 1809), page 48.

[28]*Almanach de Gotha 1810*, page 32.

[29]Malte-Brun, *Précis de la Géographie Universelle*. The original has not been seen, but only the translation published in Boston in 1824 and giving slightly different figures. Those for 1810 as given by Wagner, and for 1804 and 1810 as given by Balbi, are confirmed by a note in an undated edition of Malte-Brun printed after his death in 1826. It gives his estimate for the several continents in 1810 as reported by Wagner except that the latter's 360 million for Asia is divided into 320 to 340 million for Asia and 20 million for Oceania.

[30]J. Pinkerton and C. A. Walckenaer, *Abrégé de Géographie Moderne* (Paris 1811), page 3. According to Worcester, *Geog. Dict. or Univ. Gazet.* (2d ed. 1823), Pinkerton gave Asia 500 instead of 400 and thus the earth 700 instead of 600.

[31]Jedidiah Morse. Balbi says only "Morse in 1812." The only work published by Morse in that year was "The American Universal Geography" (6th edition). As it contains no estimate of the population of the earth the citation is probably an error.

[32]Graberg von Hemsö. J. E. Worcester's *Geographical Dictionary or Universal Gazetteer* (2d edition 1823) gives from Graberg the same total as Balbi and adds the details for the continents.

[33]J. E. Worcester, *Geographical Dictionary or Universal Gazetteer* (1817) estimate at end of Vol. II (unpaged).

[34]John Thomson & Co., *New General Atlas* (Edinburgh 1817), page XXII.

[35]Adam Christian Gaspari, G. Hassel and J. G. F. Cannabich, *Handbuch der neuesten Erdbeschreibung* (Weimar 1819), vol. I, page 329, par. 72.

[36]Rev. J. Goldsmith (Sir Richard Phillipps). *Grammar of General Geography* (London 1821) page 12. Balbi's ascription to him of an estimate of 800 million in the same year, 1821, has not been verified.

[37]J. E. Worcester. *Elements of Geography* (Boston 1822). This is probably the second edition of his *Elements of Geography, Ancient and Modern* (Boston 1819, etc.).

[38]Of the three estimates ascribed to Letronne (Antoine Jean) and dated 1824, 1825 and 1829, the last two which agree have been verified, and the first which agrees with the other two in its total, probably agrees with them also for the several continents.

[39]Achille Meissas and Auguste Michelot. *Nouvelle Géographie Methodique* (2d ed. 1828), page 333.

[40]*Almanach de Gotha 1828*, page 112.

[41]*Oriental Herald and Journal of General Literature*, vol. 21 (1829), pages 13-23 and 257-70.
[42]*Almanach de Gotha 1829*, page 117.
[43]F. A. Brockhaus, *Real-Encyklopedie* (8th ed. 1833), Art. "Erde" in vol. 3, page 678.
[44]T. G. Bradford, *Abridgement of Universal Geography compiled chiefly from Balbi's Abrégé* (Boston 1835), page 15.
[45]Friedrich de Rougemont, *Geographie des Menschen* (trans. in 1839 of a French edition of 1838), pages 13, 26, 63, 182.
[46]Moritz Fränzl, *Statistik* (Vienna 1838), page 62.
[47]Omalius d'Halloy, probably his undated *Notions élémentaires de Statistique* (Paris), pages 95 and 97, give a classification by religion totaling 737 million and another by race totaling 750 million.
[48]Christoph Bernoulli, *Handbuch der Populationistik* (1841), page 25.
[49]Balbi, *Le Potenze Preponderanti del Globo* (1843), page 7.

## TABLE II.

### Population of the Earth and of the Continents since 1850, According to the Estimates in Hübner's
### *Geographisch-Statistische Tabellen* and other Sources

The population of the several countries of the world, so far as it had then been ascertained, has been reported annually through a long series of years in the *Almanach de Gotha* (since 1823), in *Hübner's Tabellen* (since 1850), and in *The Statesman's Year Book* (since 1863). Of these three sources the best for present purposes is *Hübner's Tabellen*, because its figures are regularly combined into totals for each continent and for the world as a whole. No unbroken series of Hübner is to be found in any one library, and no American library is known to contain even half of the small volumes, but that difficulty has been surmounted with the help of the present editor of the series, Professor Eugen Würzburger, President of the Statistical Bureau of Saxony, who enlisted the aid of Dr. Heinrich Seidel of Leipzig. Dr. Seidel prepared the figures from Hübner presented in the following Table II for the years 1850–1900, inclusive. Those from the same source for the years 1901–1927 have been supplied from copies of Hübner in my own library. Dr. Seidel's compilation has been supplemented also by the insertion of a few tabulations drawn from one or another of the five authorities on whose work Table I is based.

Dr. Seidel did not succeed in finding issues of Hübner for 1853, 1856 and 1862, and doubts whether they were published. The full tables in manuscript, showing the population of each country as reported for each year within the half century, have been deposited in the Library of Congress.

## TABLE II

ESTIMATES, ARRANGED CHRONOLOGICALLY, OF THE POPULATION OF
THE EARTH AND OF THE CONTINENTS, BASED UPON
O. HÜBNER's *Geographisch-statistische Tabellen*,
Supplemented by Other Sources, 1851–1930.[1]
(In Millions)

| Date[2] | Source | Com-piler | Earth | Eu-rope | Asia | Africa | America | Aus-tralia | Polar Region |
|---|---|---|---|---|---|---|---|---|---|
| 1851 | | | 1,055 | 263 | 704 | 27.6 | 56.9 | 4.5 | .... |
| 1852 | | | 1,001 | 264 | 643 | 32.4 | 58.0 | 4.6 | .... |
| 1853 | | | ... | ... | ... | ... | ... | ... | .... |
| 1854 | | | 1,007 | 265 | 645 | 32.4 | 58.9 | 5.1 | .... |
| 1854 | von Reden[3].............. | 3 | 1,135 | 266 | 763 | 46 | 56 | 4ᵃ | .... |
| 1855 | | | 1,007 | 265 | 645 | 32.4 | 59.0 | 5.1 | .... |
| 1856 | | | ... | ... | ... | ... | ... | ... | .... |
| 1857 | | | 1,043 | 270 | 668 | 33.8 | 66.6 | 5.5 | .... |
| 1858 | | | 1,067 | 274 | 683 | 38.9 | 65.5 | 5.5 | .... |
| 1859 | | | 1,068 | 274 | 684 | 38.9 | 65.6 | 5.5 | .... |
| 1859 | Dieterici[4] .............. | 3 | 1,288 | 272 | 755 | 200 | 59 | 2ᵃ | .... |
| 1860 | | | 1,074 | 276 | 684 | 40.6 | 68.2 | 5.6 | .... |
| 1861 | | | 1,093 | 279 | 700 | 40.6 | 68.1 | 5.5 | .... |
| 1862 | | | ... | ... | ... | ... | ... | ... | .... |
| 1863 | | | 1,143 | 285 | 741 | 41.2 | 70.2 | 5.7 | .... |
| 1864 | | | 1,144 | 284 | 742 | 41.1 | 70.9 | 5.7 | .... |
| 1865-66 | | | 1,148 | 286 | 743 | 41.1 | 72.0 | 5.7 | .... |
| 1866 | Behm[5]................. | 3 | 1,350 | 285 | 799 | 188 | 75 | 4ᵃ | .... |
| 1866-67 | | | 1,146 | 284 | 743 | 41.1 | 72.4 | 5.8 | .... |
| 1868 | | | 1,136 | 292 | 721 | 40.4 | 78.2 | 4.8 | .... |
| 1868 | Behm .................. | 3 | 1,375 | 293 | 805 | 191 | 81 | 4ᵃ | .... |
| 1869 | | | 1,308 | 293 | 813 | 112 | 83.1 | 7.0 | .... |
| 1870 | | | 1,300 | 293 | 803 | 114 | 83.6 | 7.0 | .... |
| 1870 | Behm[7] ................. | 3 | 1,359 | 295 | 782 | 193 | 84 | 4ᵃ | .... |
| 1871 | | | 1,309 | 293 | 824 | 100 | 85.6 | 7.0 | .... |
| 1872 | | | 1,318 | 299 | 825 | 101 | 86.6 | 7.1 | .... |
| 1872 | Behm and Wagner[8]...... | 3 | 1,377 | 302 | 794 | 193 | 85 | 4ᵃ | .... |
| 1873 | | | 1,314 | 300 | 821 | 100 | 86.6 | 6.3 | .... |
| 1874 | | | 1,369 | 301 | 799 | 175 | 87.9 | 6.4 | .... |
| 1874 | Behm and Wagner[9]...... | 3 | 1,391 | 301 | 798 | 203 | 85 | 4ᵃ | .... |
| 1875 | | | 1,365 | 302 | 799 | 170 | 86.9 | 6.5 | .... |
| 1875 | Behm and Wagner[10] ..... | 6 | 1,397 | 303 | 799 | 206 | 84 | 5ᵃ | .... |
| 1876 | | | 1,365 | 302 | 799 | 170 | 86.9 | 6.5 | .... |
| 1876 | Behm and Wagner[11]...... | 6 | 1,424 | 309 | 825 | 200 | 86 | 5ᵃ | .... |
| 1877 | | | 1,380 | 305 | 802 | 178 | 87.9 | 6.7 | .... |
| 1878 | | | 1,410 | 309 | 827 | 178 | 87.3 | 7.8 | .... |
| 1878 | Behm and Wagner[12]...... | 6 | 1,439 | 312 | 831 | 205 | 86 | 4ᵃ | .... |
| 1879 | | | 1,412 | 311 | 832 | 174 | 87.4 | 7.9 | .... |
| 1880 | | | 1,411 | 313 | 828 | 175 | 87.1 | 7.9 | .... |
| 1880 | Behm and Wagner[13]...... | 6 | 1,456 | 316 | 835 | 206 | 95 | 4ᵃ | .... |
| 1881 | | | 1,428 | 316 | 828 | 178 | 92.2 | 6.6 | .... |
| 1882 | | | 1,429 | 317 | 827 | 179 | 99.3 | 6.6 | .... |
| 1882 | Behm and Wagner........ | 5 | 1,434 | 328 | 796 | 206 | 100 | 4ᵃ | .... |
| 1883 | | | 1,413 | 329 | 795 | 181 | 101 | 6.7 | .... |
| 1884 | | | 1,435 | 331 | 796 | 196 | 103 | 7.7 | .... |
| 1885 | | | 1,480 | 336 | 829 | 196 | 110 | 7.9 | .... |
| 1886 | | | 1,484 | 339 | 830 | 196 | 112 | 8.3 | .... |
| 1887 | | | 1,488 | 341 | 828 | 198 | 112 | 8.5 | .... |
| 1888 | | | 1,497 | 344 | 831 | 199 | 115 | 8.5 | .... |
| 1889 | | | 1,509 | 348 | 831 | 200 | 121 | 8.6 | .... |
| 1890 | | | 1,514 | 350 | 832 | 200 | 123 | 8.8 | .... |
| 1891 | Wagner and Supan........ | 6 | 1,480 | 357 | 826 | 164 | 122 | 11ᵃ | .... |
| 1891-92 | | | 1,552 | 358 | 858 | 201 | 124 | 10.4 | .... |
| 1893 | | | 1,486 | 361 | 826 | 166 | 124 | 9.2 | .... |
| 1894 | | | 1,496 | 364 | 828 | 165 | 129 | 9.5 | .... |
| 1895 | | | 1,502 | 366 | 828 | 165 | 133 | 9.6 | .... |
| 1896 | | | 1,512 | 373 | 831 | 166 | 133 | 9.7 | .... |
| 1897 | | | 1,535 | 379 | 837 | 174 | 136 | 9.7 | .... |
| 1898 | | | 1,545 | 381 | 842 | 175 | 137 | 9.9 | .... |
| 1899 | | | 1,550 | 382 | 843 | 175 | 139 | 9.9 | .... |
| 1900 | | | 1,551 | 384 | 841 | 176 | 141 | 10.0 | .... |
| 1901 | | | 1,558 | 391 | 839 | 177 | 144 | 6.2 | 0.08 |
| 1902 | | | 1,539 | 392 | 814 | 182 | 145 | 6.5 | 0.08 |
| 1903 | | | 1,547 | 393 | 821 | 180 | 146 | 6.5 | 0.01 |
| 1904 | | | 1,524 | 398 | 821 | 149 | 148 | 6.6 | 0.01 |

# APPENDICES

## TABLE II (continued)

| Date | Source | Com-piler | Earth | Eu-rope | Asia | Africa | America | Aus-tralia | Polar Region |
|------|--------|-----------|-------|---------|------|--------|---------|------------|--------------|
| 1904 | Supan.................. | 6 | 1,503 | 392 | 820 | 141 | 144 | 6[a] | .... |
| 1905 | | | 1,525 | 402 | 823 | 143 | 151 | 7.7 | 0.01 |
| 1906 | | | 1,538 | 418 | 826 | 113 | 154 | 6.8 | 0.01 |
| 1907 | | | 1,547 | 422 | 829 | 133 | 156 | 6.9 | 0.01 |
| 1908 | | | 1,554 | 426 | 827 | 134 | 161 | 6.7 | 0.01 |
| 1909 | | | 1,560 | 430 | 829 | 130 | 165 | 6.8 | 0.01 |
| 1910 | . | | 1,568 | 436 | 831 | 127 | 168 | 6.9 | 0.01 |
| 1911 | | | 1,720 | 444 | 955 | 138 | 175 | 7.5 | 0.01 |
| 1912 | | | 1,679 | 447 | 909 | 139 | 177 | 7.3 | 0.01 |
| 1913 | | | 1,632 | 448 | 863 | 134 | 179 | 7.4 | 0.01 |
| 1914 | | | 1,657 | 452 | 871 | 136 | 190 | 7.8 | 0.015 |
| 1915 | | | .... | ... | ... | ..... | ..... | ... | .... |
| 1916 | | | 1,671 | 459 | 875 | 136 | 193 | 7.9 | 0.015 |
| 1917 }1918 | | | 1,689 | 462 | 885 | 137 | 197 | 8.0 | 0.015 |
| 1919 | | | .... | ... | .... | ..... | ..... | ... | .... |
| 1920 | | | 1,712 | 468 | 895 | 136 | 204 | 8.0 | 0.015 |
| 1921 | | | .... | ... | .... | ..... | ..... | ... | .... |
| 1922 | | | .... | ... | ... | ..... | ..... | ... | .... |
| 1923 | | | .... | ... | ... | ..... | ..... | ... | .... |
| 1924 | | | 1,790 | 439 | 1,007 | 126 | 210 | 7.8 | .... |
| 1925 | | | 1,813 | 451 | 1,011 | 134 | 209 | 7.9 | .... |
| 1926 | | | .... | ... | ... | ..... | ..... | ... | .... |
| 1927 | | | 1,867 | 475 | 1,024 | 132 | 228 | 8.6 | 0.016 |
| 1928 | | | .... | ... | ... | ..... | ..... | ... | .... |
| 1929 | | | .... | ... | ... | ..... | ..... | ... | .... |
| 1930 | | | .... | ... | ... | ..... | ..... | ... | .... |

[a] For Oceanica.

[1] Unless another source is noted, the figures are from Hübner.
[2] The figures speak for the year of publication, the returns being for varying dates shortly preceding that year.
[3] F. W. L. von Reden, *Deutschland und das übrige Europa* (Wiesbaden 1854), page 20.
[4] K. F. W. Dieterici, "Die Bevölkerung der Erde" in Petermann's *Mittheilungen* (1859), pages 1-19.
[5] E. Behm, *Geographisches Jahrbuch 1866*, page 128.
[6] E. Behm, *Geographisches Jahrbuch 1868*, page 81.
[7] E. Behm, *Geographisches Jahrbuch 1870*, page 90.
[8] E. Behm and H. Wagner *Die Bevölkerung der Erde*  I (1872), page v.
[9] "  "  "  "  "  "  " I (1874), page v.
[10] "  "  "  "  "  "  " III (1875), page vii.
[11] "  "  "  "  "  "  " IV (1876), page vii.
[12] "  "  "  "  "  "  " V (1878), page vii.
[13] "  "  "  "  "  "  " VI (1880), page ix.

E. G. Ravenstein (in *Statesman's Year-Book 1891*, p. xxiii), dated 1890:

| | |
|---|---|
| Europe | 380.2 |
| Asia | 830 |
| Africa | 127 |
| Australasia | 4.73 |
| No. America | 89.25 |
| So. America | 36.42 |
| Earth | 1,467.6 |

# APPENDIX II

## CRITIQUE OF OFFICIAL UNITED STATES IMMIGRATION STATISTICS

### By
### Marian Rubins Davis.

Students of migration into the United States depend almost exclusively for statistical records of the movement upon American official data. To what extent are these figures reliable? What is the population movement which they attempt to measure? A complete answer to these questions lies beyond the scope of the present note. It may serve, however, to raise a number of questions often ignored and contribute towards answering some of them.

The report of the Commissioner-General of Immigration usually contains a table giving the official figures for total immigration into the United States by years, 1820 to date. These figures are assembled from various sources and admittedly do not form a homogeneous series. In the first place, they do not employ a uniform year. Beginning with 1869 they have used the twelve months ending June 30, but for the preceding half century 28 were for calendar years, 7 for fiscal years ending September 30, two for 15-month periods ending December 31, one for a 9-month period ending September 30, and one for a 6-month period ending June 30.[1] This lack of uniformity leads to confusion and inaccuracy in the tables. It reflects the irregular periods covered by the reports originally published, but could have been obviated had the compilers chosen to assemble the material according to some uniform scheme.

A more important defect is that the statistical unit varies. "For 1820 to 1867 the figures are for alien passengers arriving; for 1868 to 1903, for immigrants arriving; for 1904 to 1906, for aliens admitted; and for 1907 to 1927, for immigrant aliens admitted."[2] Thus a note appended to the table attempts to indicate the changes. It is misleading. The change made in 1868 was a substantial one, the others were verbal; significant changes, not mentioned in the note, are revealed by an examination of the sources.

In accordance with the Act of 1819, and later the Act of 1855, the Secretary of State annually presented to Congress a statement

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[1]This is the arrangement in the 1929 report (see its Table 81). Slight variations are to be found in the reports for other years.

[2]*Report for 1929*, Table 81, head note.

concerning passengers arriving in the United States. This statement, compiled from returns received from the collectors of customs, gave the number of passengers, the age and sex of most of them, and, for most of them, the occupation and the country of birth or country to which they belonged, the precise meaning of the word "belong" in the table headings being left to inference. Beginning with 1854 there is information also with regard to the country in which passengers declared their intention of residing. The series begins with the quarter ending December 31, 1819, and is continued until 1874.[1] In the first report the information is given passenger by passenger

TABLE III.

NUMBER OF ALIEN PASSENGERS ARRIVING IN THE UNITED STATES, 1826–1866, AS RECORDED IN CONGRESSIONAL DOCUMENTS AND IN STATE DEPARTMENT REPORTS.

| Year | Totals according to | | Difference | Year | Totals according to | | Difference |
| | Congressional documents | State Department | | | Congressional Documents | State Department | |
|---|---|---|---|---|---|---|---|
| 1826 a | 10,837 | 10,449 | —388 | 1846 e | 154,416 | 154,382 | —34 |
| 1827 a | 18,875 | 18,732 | —143 | 1847 e | 234,968 | 235,081 | +113 |
| 1828 a | 27,382 | 28,690 | 1,308 | 1848 e | 226,527 | 226,521 | —6 |
| 1829 a | 22,520 | 15,303 | —7,217 | 1849 e | 297,024 | 297,001 | —23 |
| 1830 a | 23,322 | 9,468 | —13,854 | 1850 f | 369,980 | 339,950 | —30,030 |
| 1831 n | 22,633 | 15,721 | —6,912 | 1851 g | 379,466 | 379,466 | 0 |
| 1832 n | 60,482 | 37,130 | —23,352 | 1852 g | 371,603 | 370,603. | —1,000 |
| 1833 c | 58,640 | 58,334 | —306 | 1853 g | 368,645 | 368,643 | —2 |
| 1834 c | 65,365 | 65,411 | 46 | 1854 g | 427,833 | 427,833 | 0 |
| 1835 c | 45,374 | 45,417 | 43 | 1855 g | 200,877 | 200,877 | 0 |
| 1836 c | 76,242 | 76,920 | 678 | 1856 g | 200,436 | 200,436 | 0 |
| 1837 c | 79,340 | 78,035 | —1,305 | 1857 g | 251,306 | 251,306 | 0 |
| 1838 c | 38,914 | 41,161 | 2,247 | 1858 g | 123,126 | 123,126 | 0 |
| 1839 c | 68,069 | 70,509 | 2,440 | 1859 g | 121,282 | 121,282 | 0 |
| 1840 c | 84,066 | 86,405 | 2,339 | 1860 g | 153,640 | 153,640 | 0 |
| 1841 c | 80,289 | 82,029 | 1,740 | 1861 g | 91,918 | 92,004 | 86 |
| 1842 c | 104,565 | 105,998 | 1,433 | 1862 g | 91,985 | 91,982 | —3 |
| 1843 c | 52,496 | 61,803 | 9,307 | 1863 g | 176,282 | 173,588 | 2,694 |
| 1844 d | 78,615 | 78,970 | 355 | 1864 g | 193,418 | 193,431 | 13 |
| 1845 c | 114,371 | 115,864 | 1,493 | 1865 g | 248,120 | 248,083 | —37 |
| 1826–45 | 1,132,397 | 1,102,349 | —30,048 | 1866 g | 318,568 | 323,655 | 5,087 |
| | | | | 1826–1866 | 6,133,817 | 6,075,239 | —58,578 |

a Years ending Sept. 30.
b For 15 months ending Dec. 31.
c For calendar years.
d For 1844 for 9 months ending September 30.
e Years ending September 30.
f For 1850 for 15 months ending December 31.
g For 1851-66 for calendar years.

[1]The Bureau of Statistics monograph of 1903, quoted as authoritative in Volume 5 of the Immigration Commission Reports (*Statistical Review of Immigration: 1820–1910*), states that "statistics of immigration were collected by the Department of State from 1820 to 1874" (p. 3); search in the government documents has revealed published reports only through 1870 (see Table VI, p. 658), and there are gaps. The year 1833 marked the change from the practice of assembling the material by years ending September 30 to the use of the calendar year, and the last quarter of 1832 seems to have been lost in the process; the last quarter of 1867 is missing and the data for the first two quarters of 1868 are notably incomplete. A more exhaustive hunt might turn up the fugitive numbers.

(288 pages of names). In later reports it is classified by customs districts and quarters of the year. There is no systematic practice of appending totals, and those given are not reliable. The statements are full of minor omissions and inconsistencies. The official immigration figures for the years 1820–67 were presumably obtained from this material by subtracting from the number of passengers arriving the number recorded as born in or belonging to the United States. An independent calculation from the documents for 1826–66 yields 41 comparable items; of these only 8 check exactly with the official data, those for 1851 and 1854–60; 16 more items check within 1 per cent and 5 more within 2 per cent; the discrepancies in the remaining items, especially 1829, 1830, 1831, 1832 and 1843, are wide. The two sets of figures are presented in Table III, page 646.

Apparently the material was subjected before publication to drastic revision, but in the absence of information about the methods of compiling the official figures one hesitates to place much reliance upon the result.

The Bureau of Statistics of the Treasury Department collected statistics of immigration from 1867 through 1895.[1] Its statements, presented in much better form than those of the State Department, were based like them upon returns from the collectors of customs.[2] They give not only the number of passengers arriving but also the number, age, sex, occupation and country of arriving immigrants. To the Bureau of Statistics "net immigration" included all passengers arriving except United States citizens and foreigners not intending to remain in the United States, these two categories being classed as non-immigrants.[3] The Bureau of Statistics figures of net immigration for 1868–91 have been adopted in the official series now in general use. To make the earlier data consistent with those figures it would be necessary, then, to subtract from the number of aliens arriving each year, 1820–67, the number not intending to remain in the United States. Information on the basis of which such a subtraction could be made is to be had in the State Department reports beginning with 1854. More useable is a published series beginning with 1856,[4] probably compiled from this material and giving the number of "immigrants arrived" (as distinguished

[1] These are the dates given in the Bureau monograph of 1903.
[2] The New York figures for 1867–72 constitute an exception; they were obtained from the steamship companies.
[3] This "net immigration" should not be confused with the "net gain" or "net increase" of later years.
[4] See *Report of the Superintendent of Immigration for 1892*, p. 17. For 1859–66 the figures coincide almost but not quite with the figures for immigrants published by the Bureau of Statistics and apparently compiled by it from outside sources.

from alien passengers). Comparison of this series with the official immigration figures for the period 1856–66 shows the former to be 98.5 per cent of the latter.[1] The official estimate of the proportion of transients among the total alien passengers arriving 1820–56 was 2 per cent. A reduction of the official figures for 1820–55 by $1\frac{1}{2}$ per cent or 2 per cent and the adoption of the series mentioned above for immigrants 1856–67, would be a reasonable adjustment. It would result in a series of approximate and comparable figures for aliens arriving by sea and intending to remain in the United States 1820–91. In view of the numerous uncertainties with regard to the composition of the figures, they could be used for comparisons year by year only with extreme caution.

The United States Bureau of Immigration was established in 1892 and given supervision of the general immigration service set up at that time. Since the establishment of the Bureau its chief (at first entitled Superintendent, but after 1894 Commissioner-General) has issued for each fiscal year[2] a *Report* based on returns from the immigration officials on duty at the various ports of entry. The reports vary considerably from year to year in the amount and variety of their statistical data, in the care with which the material has been presented and in the amount of explanation of the figures. Tables are given in them about the age, sex, nationality, occupation, port of entry and destination of immigrants. The Bureau in compiling the official record has used its own figures for the years since it was established. By studying its annual reports and the laws and regulations governing the admission of aliens and by interviews with members of the immigration service, an attempt has been made to determine what definition of an immigrant has been adopted.

The Bureau has not adhered to one definition. This is not, of course, chargeable entirely to the officials who have been responsible for administering a set of extremely complicated and frequently changing laws. In fact the present statistical staff has shown an admirable intention to issue a set of figures that would be comparable year after year.[3] The Bureau, however, has not always had so vigorous and far-sighted a chief of the statistical division as the

[1]*Report of the Commissioner-General of Immigration for 1929*, Table 81.

[2]Ending June 30.

[3]The Act of 1924 made drastic changes in the legal definition of an immigrant alien. In subsequent years the Bureau published tables based on the new legal definition, but also tables based on the definition that had ruled in 1924 and previous years, and it gave the more prominent place in the report to the latter.

present incumbent and the continuity of its series of immigration figures has frequently been broken, not only by changes in the law but by changes in administrative practice over which it had, presumably, some control.

Obviously the service is not run for the sake of the statistical record, but necessary legal and administrative changes would be less confusing to one who is looking for comparable statistics if the Bureau had pointed out clearly what the changes were and to what extent they probably affected the figures. It has been necessary to piece together evidence of various sorts, some of it explicit, some of it inferential. Certain minor points, such as the treatment of alien seamen deserting in American ports, have been disregarded, first because the number of persons involved is small, and secondly because it has not been possible to determine from the evidence at hand what the Bureau's practice has been.

An immigrant, according to the Bureau of Immigration, apparently is an alien[1] officially admitted into the United States whose last permanent residence was in some foreign country and who comes with the declared intention of residing here permanently.[2] Before July 1907 the definitions actually used were shifting, but approached this ideal;[3] since July 1907 it has been the official definition.

One bar to comparability of the immigration totals has been the extension of the jurisdiction of the Immigration Service. At its establishment, it was given the task of regulating immigration into continental United States and Alaska. The extension of its jurisdiction since 1892 is indicated in the statistics in two ways: (a) in the table classifying immigrants by ports of entry there have been additions to the list of ports: Honolulu, 1901; San Juan, Porto Rico, 1902;[4] (b) in the table where classification is by place of intended future residence certain destinations have been added: Hawaii, 1899; Porto Rico, 1902; the Philippines, 1904; the Virgin

[1]Aliens are defined in the Act of 1917 as persons not citizens native or naturalized of the United States, except Indians of the United States not taxed and citizens of the islands under the jurisdiction of the United States.

[2]Residence of 12 months or more is considered permanent.

[3]In an official agreement of 1893 (the Canadian agreement mentioned below) is found the statement that the word immigrant "shall be understood as meaning all persons who intend remaining in the United States [and] who are not already residents or citizens of the United States."

[4]The addition of Canadian ports and Canadian and Mexican border stations is discussed below. It represents more adequate control of immigration into the original territory rather than an extension of jurisdiction.

Islands, 1917.[1]  The two tables are not cross-classified so the official
total cannot be reduced by eliminating persons entering at newly
added ports and persons destined to newly added places of future
residence in order to discover what the immigration total would have
been had the territory into which immigration was reported been
limited to its original boundaries.  It is possible, however, to elimi-
nate separately for ports and for destinations and compare the
results.  Each process reduces the official total by less than 2 per
cent for every year but 1918 and 1919, and less than 3 per cent for
those years.  The figures almost agree, so it makes little difference
which is chosen as the subtrahend.  On the whole it seems preferable
to subtract the admissions at new ports.

If, now, the figures before 1908 are examined, with the idea of
adjusting them so as to build up a series consistent with the definition
of an immigrant adopted in that year and retained thereafter, the
difficulties prove to be numerous.  One of them can be settled
readily and with confidence.  Debarred aliens were included in the
totals for 1895, 1896 and 1897; their number, which should of
course be subtracted, is given in the reports.

A more troublesome problem arises in connection with aliens
traveling first or second class.  No point in the interpretation of the
statistics is more baffling than the question whether these ''cabin
aliens'' were included in the totals.  New York counted only
steerage aliens as immigrants in 1895, and at other ports presumably
the practice was the same.  The total for all ports in 1897, 1898
and 1899 is definitely said to include only steerage passengers.  The
report for 1899 estimates that there were in that year 25,000 aliens
who arrived first or second class ''who intended to remain here and
who would have been classified as immigrants had they traveled in
the steerage.''  We have good evidence that, until after 1903,
cabin aliens were not included as a rule among the immigrants,
although as early as 1900 protests were mentioned in the reports
against the class discrimination that led immigration officers to
consider all steerage aliens immigrants, but exempt cabin aliens
from inspection.  A passage in the 1903 Report suggests that the
total number of cabin aliens entering that year (64,269) were
immigrants, though they were not so counted.  Probably cabin
aliens were included beginning with 1904, but in 1904 and 1905

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[1]Admissions into the Philippines, controlled by the ''officers of the general govern-
ment'' of the Philippines and not by the Immigration Service, are given in a separate
table and not included in the official immigration totals.

there seems to have been some confusion between cabin aliens and aliens in transit (who supposedly were not classed as immigrants). As late as 1912 the inspection and consequently to some extent the count of immigrant aliens traveling in the first or second class were said to be inadequate. The report of the New York Commissioner for that year urges better inspection of cabin aliens, giving as one reason the fact that the government is cheated of revenue when the levy of the head tax on immigrants is dependent upon steamship lists of arrivals.[1] Errors are said to be frequent, especially in taking as citizens persons who have not yet received their final naturalization papers. "Even the present imperfect cabin inspection has increased the Government revenues by thousands of dollars a year." How much the immigration totals should be augmented on account of cabin aliens it is hard to say. If the numbers cited above for 1899 and 1903 are accepted, the total for each of those years should be increased by 8 per cent, shifting into the immigrant class in the former case about half and in the latter case all the alien passengers On the basis of this and other information, cabin immigrants might be estimated as between 6 and 12 per cent of the official figures 1892–1903. Probably the most reasonable course is to accept the figure for 1899 (25,000) and increase the official totals by 8 per cent for the other years on account of cabin aliens.

The discrepancy between the Bureau of Statistics series and that of the Immigration Bureau for the years in which they overlap (1892–5) is great. It has been suggested that the larger figures of the Bureau of Statistics "include many who were counted by the Bureau of Immigration as temporary or non-immigrant arrivals."[2] That no doubt is true. But the Bureau of Statistics itself excluded from its immigration figures a number of aliens not intending to remain in the United States. It based its count also on returns from customs officers who, unlike immigration officers, are more concerned with cabin than with steerage passengers. It seems likely that some of the "temporary" arrivals included by the Bureau of Statistics but excluded by the Immigration Bureau were cabin aliens intending to reside in the United States and therefore properly considered immigrants.[3]

[1] *Report of Commissioner-General of Immigration for 1912*, p. 22 f.
[2] An official of the Immigration Bureau, quoted by H. Jerome in *Migration and Business Cycles*, p. 30.

[3]

| | Bureau of Statistics | | Bureau of Immigration | |
|------|------------|-------------|------------|-------------|
| | Immigrants | Other Aliens | Immigrants | Other Aliens |
| 1892 | 623,084 | 21,269 | 579,663 | 64,690 |
| 1893 | 502,917 | 40,750 | 439,730 | . . . . . . |
| 1894 | 314,467 | 32,940 | 285,631 | . . . . . . |
| 1895 | 279,948 | 21,201 | 258,536 | . . . . . . |

In the first two years after its creation (1892 and 1893) the Bureau of Immigration did not attempt to count immigrants entering the United States from or through British North America or Mexico. On September 9, 1893, an agreement was concluded between the Superintendent of Immigration and the steamship lines plying between Europe and Canada and railroads in Canada, whereby the steamship companies were to bring to designated ports of inspection in Canada all their immigrants destined for the United States, and only upon presentation of certificates issued to immigrants by officials who had completed their inspection were the railroad companies to sell them transportation. The agreement became effective in October, 1893, and accordingly entries through Canada were included for the first time in the report for 1894. So the Bureau, early in its history, came to grips with what has been its most perplexing problem—control of immigration over the land boundaries.[1] The extension of the border service, on both northern and southern borders, has been gradual. In 1906 for the first time, Canadian and Mexican border stations were expressly included in the points of entry in the main immigration tables, but the former had actually been included since 1893 and two of the Mexican border stations—one of them El Paso, the most important—at least as early as 1904, while there is evidence that an arrangement similar to the Canadian was functioning in Mexico in 1902. It seems impracticable to adjust the official totals for immigrants coming through Mexico; we might, however, increase the figures for 1892 and 1893 on account of entries through Canada.[2] We have an estimate from Canadian sources for Europeans who entered the United States after landing at Quebec and Halifax during the twelve months preceding October 1893, but it seems unreliable; a more reasonable adjustment would be to add each year the average number of entries through Canada for the first five years after the agreement went into effect. This is, in round numbers, 10,000; that figure can hardly be too large, for it is only about one-fifth of the Canadian estimate.

In no year, however, is the record complete. In spite of all efforts the amount of clandestine immigration through Canada and Mexico has been great. The reports of the Bureau mention it frequently,

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[1]The Department of State had recorded until 1855 only passengers arriving by sea; in that year an attempt was made to count persons entering across the northern border, but it seems to have had little success.

[2]An addition to the figure for 1894 on account of the missing first quarter of that year seems an unwarranted refinement.

indicate some of the methods of evasion and deplore the entry by this route of large numbers of diseased and otherwise undesirable aliens. These clandestine migrants, it would seem, are chiefly from the Old World, but since the imposition of the literacy test numbers of Mexicans have entered in that way. The Bureau lauded the work of the border patrol and denounced those who crossed in violation of the law. But under the pressure of a war-time demand for labor on the large farms of the southwest, on the railroads and in certain government industries, and using its discretionary power, it waived requirements which it had urged in time of peace, and admitted over 70,000 otherwise inadmissible aliens with no reasonable expectation of being able to enforce their departure later. These admissions constitute an exception to its usual policy. Increasing rigor of inspection and exclusion, especially under the restrictive measures of recent years, have increased the incentive to clandestine entry. Little reliance can be placed upon estimates of the amount of clandestine immigration;[1] from the nature of the case they are peculiarly liable to error. For the most part the Bureau has refrained from definite statements and such estimates as it has made do not inspire confidence.[2]

It is impossible, therefore, to say how much the official immigration figures understate the amount of border immigration; even on their showing, the stream through the neighboring countries has been considerable.

For some time the service at the Canadian ports and on the borders was concerned only with inspecting and recording immigrants from other countries entering the United States through Canada or Mexico. This included, theoretically, not only those arriving at Canadian or Mexican ports manifested for the United States and proceeding directly thither, but also those crossing the

[1][In this connection see comments on Mexican migration, p. 581 ff.—Ed.]

[2]See, for example, the estimate in the 1923 *Report* (page 12) of illegal entries of all kinds. It was necessary, on the ground of failure to prove legal entry into the United States to refuse 20 per cent of the applications of alien residents for re-entry permits during 1925 (the first year in which such permits were required). The total number of applications acted upon was about 90,000. On this basis the Bureau estimated that 20 per cent of the alien population of 7,000,000 might be found unable to prove legal entry into the United States. But the failure to establish legal entry is by no means proof that an alien entered in an unlawful manner, for the Bureau's records are so kept that an alien, to prove that he entered legally, must state the date, place and ship and in many cases the spelling, often incorrect, given his name on the manifest sheet. Furthermore, in 1926 and 1927 the proportion of refusals instead of 20 per cent was only 5 per cent. Lastly the large majority of the 7,000,000 aliens in 1920—if the figures for 1900 may be taken as a guide—had been in the United States more than 5 years and entered therefore before any drastic legal restrictions had been imposed.

border into the United States shortly after landing in Canada or Mexico. It did not, however, include citizens or permanent residents[1] of Canada or Mexico coming from such territory. The regulations of July 1, 1907, ordered the inclusion, as immigrants, of residents and citizens of Canada or Mexico entering the United States. One must ask at once whether this regulation constituted a real departure or merely crystallized an innovation that had crept in gradually. From the evidence at hand it would appear that through 1903 the practice had been unchanged. Probably in 1904, and almost certainly in 1905, 1906 and 1907, alien residents of Canada or Mexico entering the United States were included as immigrants, but native Canadians and Mexicans coming from Canada and Mexico were not regularly included until 1908.[2] Information is found in the reports of the United States Commissioner of Immigration at Montreal about Canadian citizens admitted to the United States for permanent residence, 1908-14. Their number amounts on the average to 4 per cent of the official immigration minus this class of immigrants. The information about Mexican citizens is scant and unsatisfactory; about 2 per cent might be added to the immigration figures before 1908, for uncounted Mexican immigrants.

The term "non-immigrant alien" is found in reports before 1906, but its consistent and systematic use dates from that time. Non-immigrant aliens are ''arriving aliens whose last permanent residence was in the United States, and other arriving aliens whose final destination is not within the United States,'' including tourists and aliens in transit to other countries.[3]

Aliens resident for one year or more in foreign contiguous territory coming for a temporary sojourn in the United States are not included. The total number of non-immigrants is given, beginning with 1906, and for each year, 1906-20, there is a table of non-immigrants classified by country of last permanent residence and country of final destination, furnishing a basis for a tentative

[1]Permanent residence is generally defined as residence of 12 months or more, but as late as 1901 only those aliens from foreign contiguous territory were counted as immigrants who were manifested to this country or who entered ''within 30 days after their arrival at the ports of such foreign contiguous territory.''

[2]From 1894 through 1907 the figure for total immigration included a number of immigrants ''from'' British North America and Mexico whose exact status it is impossible to determine. Until 1904 the number was inconsiderable. Beginning with 1899, when the classification by ''race or people'' was adopted, we have in the reports figures for Mexican immigrants admitted from Mexico, but until 1908 they are very small.

[3]This definition differs from the earlier definition of non-immigrants by the Bureau of Statistics.

classification of the total into the three great classes: tourists, transits, and persons resuming domicile in the United States. Transits, in general, are non-immigrant aliens giving as their destination a country outside of the United States on a continent other than the one in which they had their last permanent residence; tourists are those who give as their destination a country in the same continent as their last permanent residence; and persons resuming United States domicile are those who give the United States as the last permanent residence and the destination. Certain qualifications should be noted, however: (a) Non-immigrant aliens from British North America going to other North American countries (excepting of course the United States), and persons from other North American countries going to British North America, are regarded as transits, not tourists. (b) Non-immigrants giving the United States as either their last permanent residence or their destination are not included as tourists or transits. Persons from the United States and not destined to it, and persons destined to it but not having had their last permanent residence in it, do not fall into the third class or persons resuming domicile, but form a sort of doubtful fringe which prevents the classification from being exhaustive. (c) That fringe is increased by persons, except those from or destined to Europe or Asia or the United States, who give ''other countries'' (unspecified) as their destination or last permanent residence. They have been excluded because it is impossible to say whether they should be called tourists or transits. In only one year (1906) did the doubtful fringe amount to as much as 1 per cent of the total number of non-immigrants, and in that year it was less than 2 per cent. Our classification[1] shows the number of aliens resuming domicile to be a little more than half of the total number, and the class of transits to be more numerous than tourists for the whole period but fewer in 1915 and following years.

Beginning with 1906 non-immigrant aliens have been excluded from the immigration totals. There is reason to suppose that the Immigration Bureau theoretically excluded tourists and transits from the beginning.[2] In the 1903 report, however, there is a statement to the effect that exemption from head tax of aliens in transit is impracticable because it is too difficult to determine whether aliens are in transit or not. Probably a small number of tourists

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[1] For the figures see Table IV, page 656.

[2] Except in 1898 when aliens in transit were expressly included, and in 1905 when tourists were included. As figures are given for these groups the appropriate adjustments can be easily made.

TABLE IV.

CLASSIFICATION OF NON-IMMIGRANT ALIENS.

| Fiscal Year | Resuming U. S. Domicile | Transits | Tourists | Going from | | Indeter-minate | Total |
|---|---|---|---|---|---|---|---|
| | | | | U. S. to Other Countries | Other Countries to U. S. | | |
| 1906 | 20,616 | 30,459 | 9,853 | 160 | 257 | 673 | 65,618 |
| 1907 | 88,674 | 49,617 | 14,285 | 213 | . . . | 331 | 153,120 |
| 1908 | 86,570 | 40,738 | 14,247 | 244 | . . . | 26 | 141,825 |
| 1909 | 138,680 | 34,890 | 18,632 | 235 | . . . | 12 | 192,449 |
| 1910 | 94,075 | 35,749 | 26,342 | 294 | . . . | 7 | 156,467 |
| 1911 | 83,818 | 38,378 | 29,342 | 160 | . . . | 15 | 151,713 |
| 1912 | 90,458 | 57,057 | 31,059 | 396 | . . . | 13 | 178,983 |
| 1913 | 102,604 | 92,543 | 33,630 | 546 | . . . | 12 | 229,335 |
| 1914 | 94,689 | 53,990 | 35,497 | 268 | . . . | 157 | 184,601 |
| 1915 | 62,667 | 20,645 | 23,812 | 268 | . . . | 152 | 107,544 |
| 1916 | 32,628 | 13,556 | 21,430 | 287 | . . . | 21 | 67,922 |
| 1917 | 30,805 | 13,694 | 22,520 | 322 | . . . | 133 | 67,474 |
| 1918 | 24,907 | 14,523 | 61,356 | 384 | . . . | 65 | 101,235 |
| 1919 | 27,025 | 28,712 | 39,781 | 262 | 2 | 107 | 95,889 |
| 1920 | 83,747 | 46,578 | 60,452 | 528 | 39 | 231 | 191,575 |
| 1906–20 | 1,061,963 | 574,729 | 442,238 | 4,567 | 298 | 1,955 | 2,085,750 |

and transits coming in the steerage were mistakenly classed each year as immigrants; how many, it is impossible to say. The numbers of tourists and transits in the classification of non-immigrants for 1906–20 would give material from which to estimate the maximum number of such persons for each of the earlier years, but it would be unreasonable to designate any percentage of that maximum as the number of such aliens wrongly classed as immigrants. With aliens resuming domicile in this country the situation is more definite. In 1905 and presumably in earlier years they were considered immigrants. In 1906 and since they have been classed as non-immigrants and excluded from the immigration totals. If we add to the immigration totals for the years 1906–20 the number of aliens resuming domicile according to the classification of non-immigrants, and work out the relation of the number of aliens resuming domicile to that sum, percentages are reached varying from less than one to more than 18, with an average of 10 per cent.

In view of all this confusion, is it possible to take the bull by the horns, make all the suggested adjustments and offer an estimated series of immigration figures which will be based on the official definition of 1907?

The following steps can be taken: (1) subtract from the official totals the number of admissions each year to outlying possessions, thus restricting the data to continental United States and Alaska; (2) subtract from the figures for 1895, 1896 and 1897 the number of aliens debarred, from the figure for 1898 the number of transits, and from the figure for 1905 the number of tourists; (3) add 10,000 to each of the figures for 1892 and 1893, for entries through Canada; (4) increase the figure each year, 1892–1907, by 6 per cent of the total on account of Canadian and Mexican immigrants; (5) add 25,000 to the figure for 1899 and increase the total figure for each year, 1892–98 and 1900–03, by 8 per cent on account of cabin immigrants and (6) subtract 10 per cent of the total from each figure, 1892–1905 on account of aliens resuming domicile in this country. Carrying these steps through one obtains the figures given in Table V under ''Consistent Series.''

The chances of error in these adjustments are many, and the divergence of the figures in the final series from the corresponding official totals is no indication of the accuracy of either. Successive additions and subtractions may leave one at the end near the starting point, but the risk of the journey is to be measured by the greatness of the additions and subtractions rather than by the smallness of the net change. No strong claims are made for the ''Consistent Series'' of Table V. At best it is a guess and will have served its purpose if it suggests how variable, from year to year, have been the bases of these important figures.

TABLE V

OFFICIAL AND ''CONSISTENT'' IMMIGRATION TOTALS FOR THE UNITED STATES, 1892–1927

| Year | Official Totals | "Consistent Series" | "Consistent Series" Diff. | Year | Official Totals | "Consistent Series" | Consistent Series Diff. |
|---|---|---|---|---|---|---|---|
| 1892 | 579,663 | 613,000 | +33,337 | 1910 | 1,041,570 | 1,036,000 | —5,570 |
| 1893 | 439,730 | 467,000 | +27,270 | 1911 | 878,587 | 873,000 | —5,587 |
| 1894 | 285,631 | 297,000 | +11,369 | 1912 | 838,172 | 830,000 | —8,172 |
| 1895 | 258,536 | 266,000 | +7,464 | 1913 | 1,197,892 | 1,191,000 | —6,892 |
| 1896 | 343,267 | 354,000 | +10,733 | 1914 | 1,218,480 | 1,212,000 | —6,480 |
| 1897 | 230,832 | 238,000 | +7,168 | 1915 | 326,700 | 323,000 | —3,700 |
| 1898 | 229,299 | 236,000 | +6,701 | 1916 | 298,826 | 295,000 | —3,826 |
| 1899 | 311,715 | 324,000 | +12,285 | 1917 | 295,403 | 291,000 | —4,403 |
| 1900 | 448,572 | 467,000 | +18,428 | 1918 | 110,618 | 107,000 | —3,618 |
| 1901 | 487,918 | 506,000 | +18,082 | 1919 | 141,132 | 138,000 | —3,132 |
| 1902 | 648,743 | 664,000 | +15,257 | 1920 | 430,001 | 427,000 | —3,001 |
| 1903 | 857,046 | 875,000 | +17,954 | 1921 | 805,228 | 802,000 | —3,228 |
| 1904 | 812,870 | 770,000 | —42,870 | 1922 | 309,556 | 307,000 | —2,556 |
| 1905 | 1,026,499 | 970,000 | —56,499 | 1923 | 522,919 | 520,000 | —2,919 |
| 1906 | 1,100,735 | 1,156,000 | +55,265 | 1924 | 706,896 | 704,000 | —2,896 |
| 1907 | 1,285,349 | 1,337,000 | +51,651 | 1925 | 294,314 | 294,000 | —314 |
| 1908 | 782,870 | 771,000 | —11,870 | 1926 | 304,488 | 304,000 | —488 |
| 1909 | 751,786 | 749,000 | —2,786 | 1927 | 335,175 | 335,000 | —175 |
| 1892–1909 | 10,881,061 | 11,060,000 | +178,939 | 1910–27 | 10,055,957 | 9,989,000 | —66,957 |
| | | | | 1892–1927 | 20,937,018 | 21,049,000 | +111,982 |

APPENDICES

## TABLE VI.

STATE DEPARTMENT REPORTS CONTAINING IMMIGRATION STATISTICS, 1820–1870.

*Year ending Sept. 30:*                                     *Document*

| Year | Congress | | Session | | Document | | No. |
|---|---|---|---|---|---|---|---|
| 1820 | 16th | Congr. | 2nd | Sess. | Senate Document | | No. 118 |
| 1821 | 17th | " | 1st | " | House " | | " 134 |
| 1822 | 17th | " | 2nd | " | " " | | " 107 |
| 1823 | 18th | " | 1st | " | " Executive Document | | " 161 |
| 1824 | 18th | " | 2nd | " | " .Document | | " 108 |
| 1825 | 19th | " | 1st | " | " Executive Document | | " 175 |
| 1826 | 19th | " | 2nd | " | " " " | | " 143 |
| 1827 | 20th | " | 1st | " | " " " | | " 287 |
| 1828 | 20th | " | 2nd | " | " " " | | " 141 |
| 1829 | 21st | " | 1st | " | " " " | | " 114 |
| 1830 | 21st | " | 2nd | " | " " " | | " 127 |
| 1831 | 22nd | " | 1st | " | " " " | | " 293 |
| 1832 | 22nd | " | 2nd | " | " " " | | " 119 |

*Calendar Year:*

| Year | Congress | | Session | | Document | | No. |
|---|---|---|---|---|---|---|---|
| 1833 | 23rd | " | 1st | " | House Executive Document | | " 319 |
| 1834 | 23rd | " | 2nd | " | " " " | | " 184 |
| 1835 | 24th | " | 1st | " | " " " | | " 237 |
| 1836 | 24th | " | 2nd | " | Senate Document | | " 178 |
| 1837 | 25th | " | 2nd | " | House Executive Document | | " 427 |
| 1838 | 25th | " | 3rd | " | Senate Document | | " 252 |
| 1839 | 26th | " | 1st | " | House Executive Document | | " 254 |
| 1840 | 26th | " | 2nd | " | " " " | | " 116 |
| 1841 | 27th | " | 2nd | " | " " " | | " 219 |
| 1842 | 27th | " | 3rd | " | " " " | | " 177 |
| 1843 | | | | | | | |

*Year ending Sept. 30:*

| Year | Congress | | Session | | Document | | No. |
|---|---|---|---|---|---|---|---|
| 1844 | 28th | " | 2nd | " | House Executive Document | | " 13 |
| 1845 | 29th | " | 1st | " | " " " | | " 216 |
| 1846 | 29th | " | 2nd | " | " " " | | " 98 |
| 1847 | 30th | " | 1st | " | " " " | | " 47 |
| 1848 | 30th | " | 2nd | " | " " " | | " 10 |
| 1849 | 31st | " | 1st | " | " " " | | " 7 |

*Quarter ending Dec. 31:*

| Year | Congress | | Session | | Document | | No. |
|---|---|---|---|---|---|---|---|
| 1850 | 31st | " | 2nd | " | House Executive Document | | " 100 |

*Calendar Year:*

| Year | Congress | | Session | | Document | | No. |
|---|---|---|---|---|---|---|---|
| 1851 | 32nd | " | 1st | " | House Executive Document | | " 100 |
| 1852 | 32nd | " | 2nd | " | " " " | | " 45 |
| 1853 | 31st | " | 1st | " | " " " | | " 78 |
| 1854 | 33rd | " | 2nd | " | " " " | | " 77 |
| 1855 | 34th | " | 1st | " | " " " | | " 29 |
| 1856 | 34th | " | 3rd | " | " " " | | " 78 |
| 1857 | 35th | " | 1st | " | " " " | | " 62 |
| 1858 | 35th | " | 2nd | " | " " " | | " 92 |
| 1859 | 36th | Congr. | 1st | " | House Executive Document | | " 32 |
| 1860 | 36th | " | 2nd | " | " " " | | " 81 |
| 1861 | 37th | " | 2nd | " | " " " | | " 111 |
| 1862 | 37th | " | 3rd | " | " " " | | " 67 |
| 1863 | 38th | " | 1st | " | " " " | | " 53 |
| 1864 | 38th | " | 2nd | " | " " " | | " 76 |
| 1865–6 | 39th | " | 1st | " | " " " | | " 65 |
| 1866–7 | 39th | " | 2nd | " | " " " | | " 39 |
| 1867–8 | 40th | " | 2nd | " | " " " | | " 18 |
| 1869 | 41st | " | 2nd | " | " " " | | " 235 |
| 1870 | 41st | " | 3rd | " | " " " | | " 92 |