

pendulum vibrating seconds, not *at* but *in the latitude of* London: a very different thing, as General Sabine has pointed out in his "*Account of Experiments to determine the figure of the Earth by means of a Pendulum vibrating Seconds in different latitudes.*" For the object would have been then, as it really was on the occasion of the actual destruction of the parliamentary standard in 1834, not to *produce* a theoretically *better*, but as far as possible to *reproduce* the same *identical* length by the most summary process; without undertaking circumnavigatory voyages, or entering on any theoretical discussion. The new act necessary for legalizing the standard so arising would probably have sanctioned this procedure, and we should have thenceforward had a standard of a purely local character, assuming for the fundamental basis the individual seconds pendulum *in* London.

(12.) This, however, is not now the case. On the destruction of the standard of 1760 by the burning of the Houses of Parliament, the new standard was constructed, not by any measurement of the length of the pendulum (for in the ten years elapsed since 1826 very grave doubts had been raised, or rather very serious sources of error pointed out in the processes used for the purpose on the former occasion)—but, by an assemblage and most careful comparison of all the scales and standards of any authority which could be got together—resulting in the production of one primary and a great many secondary standards, in all human probability absolutely identical with that destroyed. The act, moreover, (of 1855) which constituted that one our legal yard,