

RATES OF DECK WATCHES

ON TRIAL

FOR PURCHASE BY THE BOARD OF ADMIRALTY,

AT THE

ROYAL OBSERVATORY, GREENWICH.

FROM 1904 OCTOBER 8 TO 1905 JANUARY 28.

RATES OF DECK WATCHES ON TRIAL FOR PURCHASE BY THE ADMIRALTY AT THE

(1) WEEKLY RATES IN ORDER OF TIME.

NAME	No.	Oct. 8-15.	Oct. 15-22.	Oct. 22-29.	Oct. 29 to Nov. 5.	Nov. 6-12.	Nov. 12-19.	Nov. 19-26.	Nov. 26-30.	Nov. 30 to Dec. 6.	Dec. 6-12.	Dec. 12-17.				
MAKER.		Watch Horizontal. Dial up.														
								Watch Vertical. Pendant up. †		Watch Vertical. Pendant right. †		Watch Vertical. Pendant left. †		Watch Vertical. Pendant up. †		Watch Horizontal. Dial up. ‡
Newcombs	151340	+ 5.6	+ 5.1	+ 5.0	+ 7.8	+ 10.0	+ 9.9	+ 10.0	+ 2.5	+ 3.7	+ 2.8	+ 5.1	+ 8.5			
Rich and Gaydon	2559	+ 5.2	+ 1.8	+ 2.8	+ 2.8	+ 2.8	+ 2.8	+ 2.8	+ 1.7	+ 1.7	+ 1.7	+ 1.7	+ 1.7	+ 1.7	+ 1.7	+ 1.7
Wolfsden	57226	+ 23.4	+ 27.0	+ 26.0	+ 27.6	+ 28.8	+ 28.8	+ 28.8	+ 17.8	+ 17.8	+ 17.8	+ 17.8	+ 17.8	+ 17.8	+ 17.8	+ 17.8
H. White (Manchester, Kullberg)	6011	+ 8.0	+ 7.6	+ 5.5	+ 3.0	+ 2.1	+ 1.1	+ 1.2	+ 11.0	+ 12.6	+ 11.7	+ 8.6	+ 5.6	+ 5.6	+ 5.6	+ 5.6
		+ 1.3	+ 2.7	+ 1.2	+ 1.0	+ 2.2	+ 0.1	+ 0.1	+ 9.5	+ 10.5	+ 1.2	+ 10.5	+ 8.3	+ 8.3	+ 8.3	+ 8.3
J. Player and Son	31887	- 6.8	- 6.0	- 7.6	- 7.8	- 5.1	- 6.5	- 12.2	- 20.3	- 19.4	- 21.9	- 22.1	- 17.8			
Hamilton and Co.	34073	- 1.7	+ 1.3	- 0.6	- 1.8	+ 3.6	+ 0.8	+ 0.2	- 20.1	+ 1.2	- 3.7	+ 3.9	+ 1.6			
Sheffield Gold and Silversmiths Co.	38446	+ 4.9	+ 6.8	+ 7.2	+ 6.9	+ 8.1	+ 8.8	+ 0.6	+ 15.9	+ 15.4	+ 11.4	+ 15.9	+ 4.9			
Newcombs and Co.	145647	+ 0.9	+ 1.8	+ 1.8	+ 0.8	- 0.7	- 5.5	- 6.5	+ 2.5	+ 5.9	+ 2.6	+ 6.5	+ 9.1			
Dyson	40899	+ 5.8	+ 4.2	+ 4.4	+ 2.7	+ 2.1	- 6.6	- 9.5	- 11.2	- 14.9	- 13.1	- 9.1				
Newcombs	145699	+ 3.1	+ 4.2	+ 3.7	+ 0.4	+ 3.2	+ 0.6	+ 7.7	+ 15.1	+ 12.3	+ 4.9	+ 0.2	+ 20.1	+ 11.9		
Usher and Cole	30084	- 20.9	- 22.4	- 22.4	- 22.4	- 22.4	- 22.4	- 22.4	- 12.3	- 4.9	- 12.9	- 13.9	- 18.8			
Buckley	21454	+ 7.6	+ 10.6	+ 12.8	+ 13.8	+ 14.5	+ 12.6	+ 7.7	+ 12.3	+ 7.5	+ 12.9	+ 1.2	+ 4.9			
Davis	1714	- 0.9	- 0.4	+ 2.1	+ 4.2	+ 4.8	+ 4.6	+ 0.6	+ 4.7	- 27.8	- 28.2	+ 10.2	+ 10.1			
Reid and Sons	9612	+ 3.7	+ 9.2	+ 11.0	+ 12.2	+ 14.3	+ 14.5	+ 8.1	+ 0.2	- 9.7	- 3.8	+ 9.7	+ 15.1			
Yeomans	93632	- 4.2	- 4.6	- 3.1	- 3.5	- 3.6	- 5.1	- 11.1	- 9.1	- 11.4	- 8.5	- 6.1	+ 5.7			
Wales & McCulloch	34229	+ 12.7	+ 13.6	+ 9.2	+ 9.5	+ 10.1	+ 1.1	+ 9.6	+ 22.2	+ 14.2	+ 6.6	+ 35.4	+ 10.2			
L. Hall	1774	- 20.0	- 17.6	- 21.1	- 22.2	- 20.8	- 22.1	- 24.0	- 1.1	+ 1.4	- 13.8	- 8.9	- 27.9			
Boulton	57307	+ 28.3	+ 28.5	+ 27.6	+ 28.1	+ 29.0	+ 25.4	+ 10.8	+ 47.9	+ 37.9	+ 24.5	+ 30.6	+ 22.6			
Hamilton and Co.	37588	+ 62.2	+ 56.2	+ 59.0	+ 53.2	+ 61.4	+ 58.6	+ 45.0	+ 45.0	+ 45.0	+ 55.8	+ 59.3	+ 70.6			
Yeomans	93631	- 13.2	- 11.7	- 12.3	- 11.8	- 9.9	- 12.9	- 2.3	- 3.3	- 2.6	- 3.3	+ 1.1	+ 6.7			
Boulton	57307	- 49.8	- 49.6	- 52.5	- 52.7	- 51.9	- 53.2	- 43.2	- 30.1	- 27.8	- 42.0	- 43.4	- 46.6			
J. Player and Son	15882	+ 9.4	+ 7.9	+ 6.3	+ 9.7	+ 11.4	+ 7.3	+ 14.1	+ 43.9	+ 24.1	+ 19.4	+ 47.2	+ 18.5			
L. Hall	1776	+ 9.8	+ 9.5	+ 8.3	+ 7.1	+ 6.1	+ 3.9	+ 11.1	+ 6.8	+ 4.4	+ 32.4	+ 1.4	+ 17.4			
Sims	65149	+ 2.1	+ 1.4	+ 3.6	+ 1.0	+ 4.9	+ 6.2	+ 18.9	+ 19.1	+ 18.0	+ 17.7	+ 15.4	+ 15.0			
Yeomans	93632	- 7.8	- 3.7	- 2.1	- 3.2	- 3.2	- 4.2	- 9.6	+ 8.6	+ 11.9	+ 10.0	+ 16.3	+ 7.0			
Hewitt	58847	- 2.2	+ 3.8	+ 2.2	- 3.8	- 0.7	- 4.0	- 0.0	+ 16.6	+ 14.8	+ 20.8	+ 17.2	+ 3.4			
Newcombs	151338	+ 5.5	+ 15.4	+ 10.0	+ 8.0	+ 10.0	+ 5.9	+ 4.1	+ 3.2	+ 1.6	+ 2.1	+ 17.7	+ 13.3			
Chandler	56897	+ 0.2	+ 1.2	+ 2.6	+ 7.2	+ 0.9	+ 10.9	+ 10.9	+ 16.1	+ 21.6	+ 17.7	+ 17.7	+ 15.5			
L. Hall	1776	+ 11.8	+ 12.8	+ 13.8	+ 14.0	+ 14.6	+ 14.6	+ 9.5	+ 25.0	+ 23.6	+ 29.7	+ 28.5	+ 9.1			
Yeomans	93433	+ 7.1	+ 12.3	+ 1.9	+ 3.5	+ 5.1	+ 2.3	+ 2.7	+ 24.0	+ 18.2	+ 14.7	+ 18.7	+ 11.6			
L. Hall	1774	+ 12.3	+ 13.0	+ 13.6	+ 13.7	+ 21.2	+ 18.7	+ 18.7	+ 7.9	+ 4.9	+ 18.0	+ 28.7	+ 3.0			
Wolfsden	145724	+ 0.4	+ 2.0	+ 1.1	+ 4.1	+ 4.9	+ 1.3	+ 0.3	- 3.8	- 4.9	- 4.0	- 2.8	+ 6.4			
Newcombs and Co.	151938	+ 1.8	+ 4.6	+ 4.2	+ 0.1	+ 3.8	+ 3.8	+ 7.7	+ 4.7	+ 3.7	+ 5.6	+ 1.4	+ 7.0			
Smith	386	+ 1.0	+ 3.2	+ 4.5	+ 3.0	+ 3.0	+ 3.2	+ 13.9	+ 30.1	+ 28.9	+ 28.9	+ 21.5	+ 16.8			
Mean Weekly Temperature	57.7	60.6	59.0	56.3	56.5	52.8	56.7	52.7	57.5	58.4	58.4	58.4	58.4			
Extremes of Temperature as shown by the Self-Registering Thermometer	56.2-59.7	56.8-62.6	57.1-61.6	54.6-57.6	54.2-58.0	50.8-57.3	70.0-90.7	75.8-88.2	84.7-90.0	87.2-90.0	87.2-90.0	87.2-90.0	87.2-90.0			
* The Weekly Rates have been computed from the rates for three days.																
† The Weekly Rates have been computed from the rates for five days.																
‡ The Weekly rates have been computed from the rates for five days. The gas flames are exterior to the chamber, into which none of the injurious products of combustion can enter, which controls the supply of gas.																

* The Weekly Rates have been computed from the rates for three days.

† The Weekly Rates have been computed from the rates for four days.

‡ The Weekly Rates have been computed from the rates for five days.

During the period Nov. 19 to Dec. 17, the watches were placed in an oven heated by jets of gas, the temperature being regulated by Kullberg's automatic governor, which controls the supply of gas. The gas flames are exterior to the chamber, into which none of the injurious products of combustion can enter.

ROYAL OBSERVATORY, GREENWICH, FROM 1904 OCTOBER 8 TO 1905 JANUARY 28.

(2) ABSTRACT OF THE PRINCIPAL CHANGES OF RATES.

Dec. 17-24.	Dec. 24-31.	Dec. 31 to Jan. 7.	Jan. 7-14.	Jan. 14-21.	Jan. 21-28.	Difference between greatest and least Weekly Rates.	Difference between one week and the next.	Difference of Weekly Rates.	Pendant right Dial up. a.	Pendant left Dial up. b.	Pendant right Dial up. c.	Trial Number. a + 2b + c (e + d + f) + 1	NAME or MAKER.	No.
+ 8.1	+ 10.0	+ 12.2	+ 10.5	+ 11.6	+ 10.0	7.2	2.7	- 5.5	- 5.6	- 6.5	- 6.5	12.6	Newcombs and Co.	151940
+ 1.3	+ 4.4	+ 2.5	+ 2.9	+ 1.1	+ 2.5	7.6	4.5	- 6.1	- 6.0	- 6.1	- 6.1	21.8	Rich and Gaydon	2559
+ 17.9	+ 21.6	+ 18.9	+ 21.2	+ 17.0	+ 23.1	8.0	8.0	- 5.0	- 5.0	- 5.0	- 5.0	25.2	Wolfsden	67226
+ 6.8	+ 6.8	+ 6.8	+ 6.8	+ 6.8	+ 6.8	9.2	9.2	- 18.3	- 16.0	- 15.1	- 15.1	12.6	H. White (Manchester, Kullberg)	6011
+ 2.8	+ 0.0	+ 1.6	+ 1.6	+ 1.6	+ 1.6	10.6	10.6	- 5.6	- 5.6	- 5.6	- 5.6	21.6		
- 15.1	- 15.9	- 14.9	- 12.2	- 14.4	- 16.0	12.7	6.7	- 6.2	- 4.4	- 6.9	- 6.9	24.1	Player and Son	31887
- 4.2	- 5.1	- 7.8	- 2.5	- 8.7	- 9.5	12.3	6.2	+ 12.7	+ 1.9	- 0.0	- 0.0	24.7	Hamilton and Co.	34073
+ 3.8	+ 3.1	+ 2.9	+ 4.3	+ 1.7	+ 0.0	11.2	7.2	+ 13.7	+ 13.2	+ 9.2	+ 9.2	25.6	Sheffield Gold and Silversmiths Co.	38446
- 6.0	- 5.3	- 12.8	- 11.0	- 13.0	- 14.6	16.4	6.5	+ 3.8	+ 11.2	+ 7.9	+ 7.9	29.4	Newcombs and Co.	145647
- 6.9	- 7.6	- 12.2	- 8.0	- 4.1	- 10.9	16.2	8.7	- 3.9	- 3.8	- 7.5	- 7.5	33.4	Dyson	40899
+ 10.9	+ 8.0	+ 1.7	+ 3.1	+ 1.2	- 2.8	14.7	7.9	+ 7.8	- 10.3	- 9.6	- 9.6	30.5	Newcombs and Co.	145699
+ 16.6	+ 16.8	+ 15.8	+ 20.1	+ 14.7	+ 17.6	16.3	9.4	+ 7.0	- 10.4	- 9.2	- 9.2	32.7	Usher and Cole	30084
+ 9.5	+ 16.6	+ 9.1	+ 10.6	+ 12.3	+ 18.2	18.3	11.7	+ 1.7	+ 3.6	- 8.0	- 8.0	40.0	Buckley	21454
+ 8.2	+ 8.5	+ 12.9	+ 15.5	+ 9.3	+ 8.8	16.4	9.2	- 0.3	- 35.6	- 26.0	- 26.0	28.8	Davis	1714
+ 17.7	+ 16.1	+ 12.6	+ 16.8	+ 9.8	+ 1.1	16.6	7.7	+ 10.1	+ 11.8	- 13.9	- 13.9	32.0	Reid and Sons	9612
+ 10.8	+ 3.2	+ 7.9	+ 10.7	+ 10.5	+ 7.8	21.9	7.6	- 4.9	- 8.7	- 6.8	- 6.8	37.1	Yeomans	93632
+ 10.8	+ 22.7	+ 10.1	+ 11.8	+ 5.4	+ 8.7	10.2	8.4	+ 23.9	+ 4.3	- 10.5	- 10.5	42.2	Wales & McCulloch	34229
+ 25.8	+ 22.7	+ 27.9	+ 28.1	- 28.0	- 23.0	17.0	3.6	+ 29.5	+ 27.4	+ 12.2	+ 12.2	24.2	L. Hall	1774
+ 70.6	+ 72.2	+ 73.9	+ 74.8	+ 70.1	+ 72.8	24.7	5.8	- 19.5	- 12.2	- 4.8	- 4.8	33.2	Hamilton and Co.	37588
- 3.0	- 5.2	- 5.7	- 2.0	- 7.1	- 9.0	19.9	10.6	- 4.8	- 5.5	- 4.1	- 4.1	44.5	Yeomans	93631
+ 13.8	+ 11.8	+ 9.8	+ 10.4	+ 14.7	+ 12.1	12.0	8.8	- 11.6	- 7.9	+ 12.9	+ 12.9	38.0	Boulton	57307
+ 4.1	+ 0.1	+ 2.0	+ 6.3	+ 2.4	+ 2.7	21.0	12.7	- 0.8	- 1.0	- 0.7	- 0.7	45.9	J. Player and Son	15882
+ 6.6	+ 10.7	+ 6.6	+ 12.3	+ 5.4	+ 6.4	22.3	6.9	+ 19.8	+ 19.2	+ 11.3	+ 11.3	47.1	Yeomans	93633
+ 6.7	+ 10.7	+ 8.3	+ 11.3	+ 12.2	+ 13.3	22.5	6.0	- 15.2	- 19.1	+ 34.5	+ 34.5	47.3	Hewitt	58847
+ 1.0	+ 7.8	+ 3.4	+ 0.6	+ 0.6	+ 1.9	14.4	14.3	- 4.4	- 7.1	- 7.3	- 7.3	44.2	Chandler	56897
+ 16.5	+ 24.8	+ 23.1	+ 22.0	+ 21.6	+ 21.4	15.0	10.1	- 17.5	- 14.8	- 20.4	- 20.4	48.8	L. Hall	1776
+ 19.2	+ 20.7	+ 23.1	+ 21.1	+ 21.3	+ 21.2	14.0	10.1	- 17.5	- 14.8	- 20.4	- 20.4	48.8		
+ 3.6	+ 1.9	+ 1.7	- 5.6	- 4.9	- 5.2	17.9	10.4	+ 14.2	+ 11.0	+ 7.5	+ 7.5	38.7	Yeomans	93433
+ 8.0	+ 1.9	+ 1.7	- 5.6	+ 1.8	+ 1.3	20.0	7.8	+ 12.3	+ 1.7	+ 12.3	+ 12.3	49.0	L. Hall	1774
+ 8.4	+ 1.7	+ 1.7	- 5.6	+ 1.8	+ 1.3	20.2	11.6	- 6.5	- 8.3	+ 7.4	+ 7.4	48.4	Wolfsden	145724
+ 8.4	+ 1.7	+ 1.7	- 5.6	+ 1.8	+ 1.3	15.8	10.4	- 6.5	- 8.3	+ 7.4	+ 7.4	48.4	Newcombs and Co.	151938
+ 8.4	+ 1.7	+ 1.7	- 5.6	+ 1.8	+ 1.3	15.8	10.4	- 6.5	- 8.3	+ 7.4	+ 7.4	48.4	B. Smith	386

The sign + indicates a gaining rate.

The quantities a, b, c, d, e, in the formula $a + 2b + c + \frac{1}{2}(e + d + f)$, are taken numerically, without regard to sign.

Only those watches have been included in this list for which the trial number did not exceed 100.

RATES OF WATCHES ON TRIAL FOR PURCHASE BY THE ADMIRALTY AT THE

(1) WEEKLY RATES IN ORDER OF TIME.

NAME OF MAKER.	No.	Watch Horizontal, Dial up.												Watch Vertical, Dial up. +	Watch Vertical, Dial up. +	Watch Vertical, Dial up. +	Watch Vertical, Dial up. +	Watch Vertical, Dial up. +	Watch Vertical, Dial up. +
		Oct. 8-15.	Oct. 16-22.	Oct. 23-29.	Oct. 29 to Nov. 5.	Nov. 6-12.	Nov. 13-19.	Nov. 20-26.	Nov. 26-30.	Dec. 1 to Dec. 8.	Dec. 9-15.	Dec. 16-22.	Dec. 23-29.						
Sims.....	05148	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
Gold & Silverman's Co.	15087	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
Newcomb and Co.	15188	+5.8	+8.7	+6.3	+7.1	+11.6	+8.2	-0.1	+24.3	+28.2	+24.0	+31.3	+19.9						
Lilly and Co.	1329	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
Dyson.....	94837	-16.7	-14.1	-13.2	-12.1	-11.9	-13.4	+6.0	+11.8	+9.5	+14.2	+6.7	+1.4						
Newcomb.....	145796	-37.6	-38.0	-37.0	-37.0	-32.2	-30.7	-28.5	-27.8	-30.4	-29.3	-25.2							
H. White (Chapman).	1647	+14.1	+15.6	+14.9	+13.8	+14.7	+11.6	+23.6	+10.5	-3.4	-27.1	-21.1							
Gold & Silverman's Co.	15087	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
Hamilton and Co.	15188	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
L. Hall.....	1761	+8.7	+12.0	+10.5	+9.8	+8.0	+2.2	-8.6	+6.1	+4.4	+13.7	-3.1							
Carroll.....	41245	+10.2	+13.2	+7.6	+8.1	+8.9	+6.0	+3.2	+12.1	+11.4	+11.4	+17.7	+23.7						
Yomans.....	82212	+13.8	+16.9	+13.2	+13.0	+13.4	+6.8	-1.2	+84.1	+7.9	+11.7	+13.8							
Newcomb and Co.	15188	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
J. Player and Son.	38887	-17.8	-17.9	-17.8	-14.9	-14.1	-13.1	-0.2	+13.0	+12.6	+1.1	+15.1	+3.2						
Lilly and Co.	1329	+16.2	+16.1	+17.8	+16.2	+17.9	+12.3	+15.8	+17.0	+32.7	+72.6	+14.2	+5.4						
Dynes and Co.	6768	+19.4	+18.5	+23.1	+20.2	+21.6	+19.1	+12.8	-4.7	-3.5	-9.8	-5.8							
Usher and Cole.	30522	-11.6	-10.2	-13.8	-15.8	-16.4	-17.8	-19.8	-15.2	-11.9	-12.3	-12.2							
L. Hall.....	1775	-4.5	-11.0	-14.6	-14.6	-14.6	-15.2	-15.2	-15.2	-15.2	-15.2	-15.2							
Yomans.....	82212	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
Yomans.....	94349	-2.4	-1.1	-2.8	-7.0	+10.2	+1.3	+4.2	+4.2	+3.8	-0.5	+3.9	+4.1						
Davis.....	56978	-17.5	+19.8	+12.2	+11.4	+15.0	+5.6	+12.1	+0.5	-1.4	-2.2	-4.2	+13.0						
Yomans.....	80985	-5.5	+9.7	-1.1	-0.8	-2.7	-0.1	+2.1	+14.0	+13.1	+22.2	+23.6							
Graham.....	37558	-10.0	-9.7	-6.6	-8.2	-3.9	-8.0	-17.1	+8.6	+11.9	+8.2	+13.8	+11.5						
Usher and Cole.	30522	-11.6	-10.2	-13.8	-15.8	-16.4	-17.8	-19.8	-15.2	-11.9	-12.3	-12.2							
Hewitt.....	57240	-4.2	-0.8	-0.8	-2.0	-2.1	-4.2	-0.4	+11.4	+13.8	+11.4	+14.4							
Anderson.....	1911	+29.8	+20.8	+17.8	+15.9	+16.8	+12.5	+23.4	+50.9	+19.6	-25.0	+46.2	+24.8						
Newcomb and Co.	15188	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
Player and Son.	38887	-17.8	-17.9	-17.8	-14.9	-14.1	-13.1	-0.2	+13.0	+12.6	+1.1	+15.1	+3.2						
Bonniksen.....	57310	+24.3	+23.0	+24.9	+24.9	+24.9	+24.9	+24.9	+24.9	+24.9	+24.9	+24.9	+24.9						
Carley and Clemence.....	51400	+21.0	+15.2	+22.1	+22.9	+25.5	+28.3	+18.6	+46.4	+53.4	+35.7	+45.5	+23.0						
Hamilton and Inches.	37549	-5.2	-6.7	-3.8	-8.2	-12.0	-19.5	-23.4	-29.2	-24.8	-35.7	-38.2	-2.9						
Sheffield Gold and Silverman's Co.	57310	+20.1	+18.0	+21.1	+20.7	+17.8	+22.7	+5.9	+6.2	+5.9	+3.5	+0.7	+5.6						
Yomans.....	82212	-1.9	-4.8	-2.7	+0.2	+0.5	+0.1	-7.0	-25.0	-26.8	-29.7	-26.0	-2.8						
L. Hall.....	1761	+8.7	+12.0	+10.5	+9.8	+8.0	+2.2	-8.6	+6.1	+4.4	+13.7	-3.1							
Mean Weekly Temperature		57.7	60.6	59.0	56.3	56.5	52.8	56.7	52.7	57.5	58.4	58.4							
Extremes of Temperature as shown by the Self-Regulating Thermometers.....		56.2-59.7	56.8-62.6	57.1-61.6	54.6-67.6	54.6-68.0	50.8-57.3	75.0-90.7	70.3-88.2	64.7-90.0	87.2-88.8	87.2-88.8							

* The Weekly Rates have been computed from the rates for three days.
 † The Weekly Rates have been computed from the rates for four days.
 ‡ The Weekly Rates have been computed from the rates for five days.
 § The Weekly Rates have been computed from the rates for six days.
 ¶ The Weekly Rates have been computed from the rates for seven days.
 ** The Weekly Rates have been computed from the rates for eight days.
 *** The Weekly Rates have been computed from the rates for nine days.
 **** The Weekly Rates have been computed from the rates for ten days.
 ***** The Weekly Rates have been computed from the rates for eleven days.
 **** The Weekly Rates have been computed from the rates for twelve days.
 ***** The Weekly Rates have been computed from the rates for thirteen days.
 **** The Weekly Rates have been computed from the rates for fourteen days.
 ***** The Weekly Rates have been computed from the rates for fifteen days.
 **** The Weekly Rates have been computed from the rates for sixteen days.
 ***** The Weekly Rates have been computed from the rates for seventeen days.
 **** The Weekly Rates have been computed from the rates for eighteen days.
 ***** The Weekly Rates have been computed from the rates for nineteen days.
 **** The Weekly Rates have been computed from the rates for twenty days.

ROYAL OBSERVATORY, GREENWICH, FROM 1904 OCTOBER 8 TO 1905 JANUARY 28.

(2) ABSTRACT OF THE PRINCIPAL CHANGES OF RATES.

Dec. 17-24.	Dec. 24-31.	Dec. 31 to Jan. 7.	Jan. 7-14.	Jan. 14-21.	Jan. 21-28.	Difference between greatest and least Weekly Rates. Dial up. a.	Greatest difference between greatest and least Weekly Rates. Dial up. b.	Difference of Weekly Rates. Dial up. c.	Difference of Weekly Rates. Dial up. d.	Difference of Weekly Rates. Dial up. e.	Trial Number. a + 2b + 1 (c + d + e) + f	NAME OF MAKER.	No.
+ 4.4	+ 6.7	+ 7.9	+ 6.8	+ 12.8	+ 10.8	19.8	7.2	- 20.1	- 21.9	- 24.8	53.1	Sims.....	05148
- 14.3	- 14.9	- 14.1	- 17.4	- 18.2	- 22.4	19.7	11.6	+ 11.9	+ 11.4	+ 8.1	53.2	Bonniksen.....	56978
- 10.8	- 21.2	- 15.0	- 10.2	- 12.8	- 21.3	19.8	9.8	+ 11.9	+ 11.4	+ 14.4	53.3	Newcomb and Co.	15188
- 14.3	- 14.9	- 11.0	- 6.7	- 9.7	- 24.0	11.6	11.6	+ 2.6	- 12.8	- 17.9	49.9	Lilly and Co.	1329
+ 10.1	+ 18.9	+ 12.6	+ 4.8	+ 11.3	+ 5.6	29.6	10.7	+ 0.5	+ 6.5	+ 3.8	54.0	Dyson.....	94837
- 28.1	- 24.7	- 12.4	- 9.1	- 10.0	- 21.6	28.5	12.8	- 0.9	+ 0.7	- 2.4	53.1	Newcomb and Co.	145796
- 11.7	- 8.9	+ 10.0	- 6.1	- 8.2	- 6.0	19.1	13.4	+ 3.2	- 3.8	- 45.9	54.1	H. White (Chapman).	1647
- 34.1	- 51.6	- 46.0	- 50.7	- 50.7	- 7.8	28.5	8.4	+ 2.3	- 46.4	- 59.2	54.8	Gold & Silverman's Co.	15087
- 34.1	- 38.0	- 38.9	- 40.1	- 44.1	- 48.0	17.4	12.8	+ 11.6	- 39.1	- 39.7	54.8	Hamilton and Co.	15188
- 2.8	+ 4.2	+ 1.1	- 5.2	- 4.0	- 17.4	12.8	12.8	+ 18.6	+ 8.3	+ 21.6	49.0	L. Hall.....	1761
+ 10.8	+ 10.6	+ 24.6	+ 22.2	+ 24.4	+ 25.0	29.0	18.4	+ 1.4	+ 2.1	- 2.1	55.8	Carroll.....	41245
- 29.1	+ 30.0	+ 28.1	+ 28.0	+ 28.6	+ 30.3	29.2	12.5	- 7.8	+ 21.5	+ 4.7	50.2	Yomans.....	82212
- 16.1	+ 21.0	+ 18.2	+ 17.5	+ 17.0	+ 21.6	25.4	14.7	+ 4.0	- 2.8	- 6.6	54.8	Newcomb and Co.	145796
- 7.0	+ 19.0	+ 19.0	+ 19.9	+ 16.9	+ 32.1	14.6	12.1	+ 13.1	+ 11.6	- 1.1	49.7	J. Player and Son.	38887
+ 3.8	+ 1.6	+ 4.1	+ 7.9	+ 3.1	- 0.8	17.1	12.1	- 0.0	+ 17.1	- 88.2	41.3	Lilly and Co.	1329
+ 2.2	+ 5.9	+ 11.9	+ 8.1	- 2.7	+ 1.7	35.8	10.8	- 14.2	- 12.7	- 19.0	47.4	Payne and Co.	6768
- 16.7	- 16.5	- 17.8	- 18.8	- 15.3	- 17.9	18.2	13.1	+ 5.4	- 40.5	- 38.1	44.4	Usher and Cole.	30522
- 25.8	- 29.7	- 28.1	- 35.9	- 30.0	- 31.0	24.5	17.6	+ 7.4	- 9.8	- 7.2	59.2	L. Hall.....	1775
- 16.7	+ 15.5	+ 20.8	+ 23.8	+ 28.8	+ 24.0	24.5	17.6	+ 1.4	- 0.6	- 3.2	59.6	Yomans.....	82212
- 11.8	- 2.0	- 1.3	- 0.6	- 8.8	- 8.1	24.7	11.1	- 16.0	- 18.0	- 15.0	47.7	Yomans.....	94349
+ 1.1	- 2.0	- 2.2	- 0.7	- 4.4	- 7.7	25.2	11.9	- 14.5	- 14.0	- 16.8	49.0	Davis.....	56978
- 11.1	- 1.1	- 19.2	- 20.3	- 20.3	- 20.9	34.3	10.3	- 7.2	- 1.5	- 5.0	54.2	Newcomb and Co.	145796
+ 12.5	+ 12.5	+ 14.6	+ 15.5	+ 12.0	- 32.6	9.1	- 11.9	+ 13.5	- 14.7	+ 11.0	50.8	Graham.....	37558
+ 4.8	- 4.1	- 5.2	+ 14.8	+ 1.1	- 11.8	18.2	18.2	+ 18.6	+ 9.9	- 7.4	53.4	Usher and Cole.	30522
- 14.9	- 18.9	- 20.7	- 20.5	- 18.9	- 21.7	22.5	15.6	+ 12.7	+ 13.6	+ 11.2	53.7	Hewitt.....	57240
+ 15.5	+ 12.3	+ 7.9	+ 15.1	+ 11.9	+ 15.8	22.0	10.9	+ 24.5	- 4.5	- 49.1	48.8	Anderson.....	191
- 20.0	- 25.5	- 25.8	- 32.8	- 34.9	- 28.1	23.0	19.1	+ 18.4	- 4.8	+ 5.0	54.2	Newcomb and Co.	145796
- 1.1	- 0.5	+ 0.6	- 4.4	- 1.1	- 17.2	19.2	17.7	- 1.1	- 1.1	- 1.9	62.3	Player and Son.....	3822
+ 15.5	+ 16.9	+ 14.4	+ 18.3	+ 17.4	+ 17.5	23.7	18.6	- 6.3	- 4.8	- 9.5	69.9	Payne and Co.	6768
- 20.7	- 22.0	- 24.5	- 33.6	- 32.5	- 40.8	30.3	16.9	- 3.1	- 3.8	- 4.9	64.1	Bonniksen.....	56978
+ 49.0	+ 28.2	+ 37.6	+ 37.4	+ 37.2	+ 36.5	24.8	12.0	+ 22.7	+ 30.1	+ 12.4	48.8	Carley & Clemence.	514
- 8.1	- 14.0	- 15.0	- 12.7	- 14.5	- 19.8	28.6	10.6	- 23.0	- 21.1	- 16.5	49.8	Hamilton & Inches	67.6
- 11.8	- 13.9	- 21.3	- 16.9	- 15.9	- 21.9	29.2	17.8	+ 4.0	+ 6.1	- 1.9	69.8	Sheffield Gold and Sil.	375
												Silverman's Co.	15087
+ 15.5	+ 16.1	+ 14.7	+ 13.4	+ 11.4	+ 10.2	24.9	19.9	+ 4.7	+ 4.9	+ 3.0	64.7	Probst.....	689
- 19.6	- 19.5	- 18.7	- 28.8	- 25.4	- 22.6	24.9	11.6	+ 30.9	+ 56.7	+ 43.3	68.5	L. Hall.....	1761
53.6	48.8	51.8	52.9	47.1	48.1								
The sign + indicates a gaining rate.													
The quantities a, b, c, d, e, in the formula a + 2b + 1 (c + d + e) + f, are taken numerically, without regard to sign.													

ROYAL OBSERVATORY, GREENWICH, FROM 1904 OCTOBER 8 TO 1905 JANUARY 28.

(2) ABSTRACT OF THE PRINCIPAL CHANGES OF RATES

Dec. 17-24.	Dec. 24-31.	Dec. 31. Jan. 7.	Jan. 7-14.	Jan. 14-21.	Jan. 21-23.	Difference between weekly rates. Dist. up a.	Greatest difference between weekly rates and the next. Dist. up b.	Difference of Weekly Rates.			a + 2b + c + $\frac{d+e}{2}$	NAME OF MAKER.	No.	
								Pendant up -Dist. up. c.	Pendant left -Dist. up. d.	Pendant left -Dist. up. e.				
- 2 4	+ 5 3	+ 9 2	+ 8 2	+ 8 5	+ 10 4	25 5	19 8	- 8 4	- 4 7	- 5 5	65-1	Packman & Proham	7272	
0 0	- 4 2	- 4 8	- 6 3	21 5	23 3	17 8	15 2	+ 1 8	+ 2 5	- 0 9	67-2	Bonniksen	7223	
- 5 8	- 4 2	- 3 0	- 0 5	- 4 3	- 1 1	21 5	29 6	+ 3 1	- 4 4	- 30 5	62-7	H. White (Chapdelo).	7700	
- 7 17	17 1	7 1	2 9	0 9	10 2	27 7	14 3	8 2	+ 10 4	+ 8 4	61-3	Newman and Co.	16116	
+ 10 7	+ 19 6	+ 28 2	+ 27 3	+ 28 1	+ 23 7	24 6	11 9	+ 29 4	- 26 0	- 23 0	48-4	Kulberg	6012	
- 4 9	- 9 0	- 5 0	- 3 5	- 10 6	- 12 0	22 9	17 8	+ 10 6	- 12 3	- 39 6	58-0	Stanley	1607	
+ 17 0	+ 18 0	+ 23 0	+ 20 4	+ 14 6	+ 11 5	23 8	19 8	+ 7 2	+ 9 6	+ 3 3	66-8	Bonniksen	7277	
+ 10 4	8 0	- 1 8	- 9 0	- 20 9	- 45 7	11 8	45 7	- 11 8	- 3 6	- 63 3	73-8	Newman and Co.	16075	
+ 25 6	+ 24 2	+ 21 9	+ 12 2	+ 17 7	+ 25 5	15 3	15 3	+ 14 4	+ 22 6	+ 19 1	57-1	Newman and Co.	15169	
+ 3 3	+ 6 0	+ 8 9	+ 7 3	- 8 1	- 10 1	23 9	19 4	+ 8 6	- 4 9	- 37 1	62-7	Anderson	1528	
- 34 9	- 21 0	- 22 0	- 12 1	- 16 1	- 14 8	23 9	12 3	+ 31 2	+ 32 8	+ 23 4	48 3	74-1	Thornloe	61622
+ 66 7	+ 60 0	+ 62 4	+ 68 0	+ 63 4	+ 61 6	30 6	10 1	- 22 1	- 12 6	- 22 9	50 5	74-0	Dyson	12794
- 2 1	- 4 2	- 3 4	- 3 4	- 3 8	- 7 8	23 5	15 2	- 18 5	- 21 7	- 15 1	59 5	74-0	Bonniksen	57905
+ 2 3	- 1 7	- 0 8	- 0 2	- 2 2	- 0 5	23 6	18 6	- 17 9	- 18 1	- 17 0	60 8	73-6	Sims	63150
+ 22 8	+ 21 1	+ 26 0	+ 17 1	+ 12 9	- 10 0	32 2	15 3	+ 24 5	+ 24 1	- 9 9	58 7	70-0	Ycomant	52511
+ 48 9	+ 54 1	+ 52 0	+ 51 2	+ 41 0	+ 42 6	37 3	10 2	+ 22 1	+ 23 6	+ 22 4	57 7	76 5	Webster	20419
- 3 0	3 0	3 0	15 4	8 3	8 2	35 3	15 5	- 3 4	- 10 5	- 23 0	56 6	77 1	Newman and Co.	12794
- 37 0	- 49 7	- 47 4	- 51 4	- 61 1	- 63 9	45 7	13 8	- 5 1	- 2 7	- 7 3	73 7	78 0	J. B. Rent	5297
- 3 0	20 7	17 1	16 0	15 5	22 2	45 7	14 3	- 5 4	- 2 0	- 7 4	73 3	77 2	Thornloe	61629
- 9 9	- 15 3	- 12 1	- 9 9	- 8 9	- 12 9	19 1	13 9	- 5 0	- 28 1	- 11 9	46 9	78 4	Ycomant	82317
- 40 1	- 42 2	- 42 3	- 57 0	- 51 2	- 56 9	42 1	14 7	+ 8 3	+ 8 2	+ 7 7	71 5	78 4	Chandler	56880
+ 32 5	+ 33 0	+ 36 7	+ 39 6	+ 41 4	+ 37 4	23 0	11 2	- 32 0	- 32 7	- 33 6	61 4	78 5	Sheffield Gold and	38373
- 12 9	+ 13 8	+ 12 6	+ 18 4	+ 7 5	- 9 6	34 9	12 2	+ 14 6	+ 49 8	+ 26 7	59 3	79 0	Potts and Son	12369
- 12 2	- 19 0	- 17 8	- 17 8	- 20 4	- 34 9	30 6	12 6	- 30 0	- 27 7	- 28 5	50 5	79 3	H. White (Chapdelo).	7700
- 9 9	- 7 3	- 5 2	- 6 8	- 2 0	- 9 1	20 6	6 9	- 50 1	- 53 5	- 46 8	38 4	80 1	Ycomant	33320
- 16 3	- 20 3	- 21 7	- 18 0	- 19 0	- 25 5	25 8	18 7	+ 33 6	+ 11 3	- 14 6	59 2	80 3	H. White (Chapdelo).	1645
- 15 0	- 15 9	- 16 8	- 15 1	- 16 3	- 15 3	17 9	19 9	- 62 7	+ 37 0	+ 33 7	37 7	80	J. Player and Son	30198
- 20 1	- 31 9	- 38 1	- 40 1	- 39 4	- 23 9	29 4	21 1	- 7 6	- 9 1	- 11 3	70 6	80 9	Swell	7704
- 5 4	- 0 4	- 8 7	+ 0 3	- 3 7	- 7 4	35 6	22 6	- 7 2	- 4 8	- 7 6	77 7	81 2	Carley & Clemence	51515
+ 14 2	+ 5 8	+ 12 4	+ 14 8	- 4 1	- 8 9	32 4	18 9	+ 13 1	- 12 8	- 14 4	70 2	81 8	Caboot Bros.	51941
+ 18 1	+ 11 8	+ 28 2	+ 29 8	+ 25 3	+ 26 9	35 1	19 8	- 10 2	+ 9 8	- 5 8	74 7	82 4	Newman and Co.	15102
+ 21 1	+ 7 9	6 3	4 3	+ 7 2	+ 4 9	31 1	17 6	+ 3 6	+ 29 9	+ 29 6	56 4	82 7	Player and Son	31086
+ 41 1	+ 5 8	+ 48 0	+ 7 1	+ 3 3	+ 3 3	23 7	22 8	- 15 0	- 17 7	- 18 8	69 8	82 9	J. B. Rent	5297
+ 28 1	+ 35 3	- 45 0	- 28 3	- 18 7	+ 20 9	46 8	15 7	- 8 0	- 11 4	- 10 4	71 7	84 2	Swell	7704
+ 28 1	+ 35 3	- 45 0	- 28 3	- 18 7	+ 20 9	46 8	14 7	- 8 0	- 11 4	- 10 4	75 7	84 2	Rehm and Son	9861
58 5	48 8	51 6	52 9	47 1	46 1									

The sign + indicates a gaining rate.
The quantities a, b, c, d, e , in the formula $a + 2b + c + \frac{d+e}{2}$, are taken numerically, without regard to sign.

49-3-53-045-148-8-56-100-150-0-61-41-54-74-56-4

Only those watches have been included in this list for which the trial number did not exceed 100

RATES OF DECK WATCHES ON TRIAL FOR PURCHASE BY THE ADMIRALTY AT THE

(1) WEEKLY RATES IN ORDER OF TIME.

NAME OF MAKER.	No.	Oct. 8-16	Oct. 16-22	Oct. 22-29	Oct. 29 to Nov. 5	Nov. 5-12	Nov. 12-19	Nov. 19-26	Nov. 26-30	Nov. 30 to Dec. 3	Dec. 3-8	Dec. 8-12	Dec. 12-17
		Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.	Watch Horizontal. Dial up.
Newcomen and Co.	142000	+ 15.6	+ 1.7	+ 8.0	+ 1.2	+ 2.3	+ 1.8	+ 10.6	+ 6.4	+ 23.0	+ 10.7	+ 22.0	+ 18.1
Chandler	1348	+ 4.4	+ 7.6	+ 4.2	+ 2.0	+ 3.3	+ 2.7	+ 9.1	+ 13.1	+ 21.9	+ 49.3	+ 20.7	+ 24.1
H. White (Manchester)	90813	- 12.6	- 5.4	+ 1.6	+ 1.5	+ 2.8	+ 2.8	+ 13.5	+ 10.7	+ 9.1	+ 10.4	+ 12.8	+ 15.2
Lilly and Co.	1321	+ 1.8	+ 2.1	+ 3.4	+ 5.0	+ 1.7	+ 10.0	+ 13.1	+ 24.5	+ 0.2	+ 30.4	+ 21.0	+ 13.0
Sheffield Gold and Silversmiths Co.	01613	- 28.4	- 38.6	- 40.6	- 88.8	- 31.9	- 30.1	- 38.1	- 20.5	- 18.2	- 18.2	- 11.0	- 27.2
Newcomen	14703	+ 17.9	+ 17.0	+ 21.8	+ 20.6	+ 17.7	+ 8.1	+ 2.8	+ 57.1	+ 9.8	+ 1.2	+ 61.6	+ 13.9
Hewitt	57881	+ 0.2	+ 1.6	+ 0.8	+ 2.0	+ 2.1	+ 3.9	+ 28.1	+ 35.2	+ 25.9	+ 3.6	+ 61.9	+ 30.3
H. White (Champside)	1464	+ 1.6	+ 5.0	+ 5.0	+ 3.7	+ 3.3	+ 3.9	+ 3.5	+ 21.5	+ 14.0	+ 14.2	+ 16.1	+ 2.8
Usher and Cole	90520	- 7.7	+ 1.2	+ 2.6	+ 2.5	+ 0.1	+ 4.8	+ 21.5	+ 22.1	+ 30.5	+ 13.3	+ 22.4	+ 21.8
Yousmans	80983	+ 10.1	+ 12.8	+ 14.7	+ 9.2	+ 5.0	+ 1.6	+ 4.2	+ 35.2	+ 30.4	+ 14.2	+ 27.6	+ 30.2
Lister and Son	50940	+ 18.4	+ 6.2	+ 1.5	+ 2.1	+ 0.2	+ 1.4	+ 27.7	+ 10.5	+ 14.9	+ 17.0	+ 17.9	+ 17.1
Sewell	43771	- 32.3	- 22.2	- 28.8	- 64.9	- 88.9	- 40.2	- 33.0	+ 10.2	+ 8.2	+ 35.2	+ 12.8	+ 30.4
Yousmans	76779	+ 8.1	+ 10.2	+ 5.7	+ 3.5	+ 8.5	+ 22.1	+ 23.0	+ 41.3	+ 41.1	+ 41.3	+ 44.6	+ 17.0
Ritchie and Son	01385	- 3.5	- 13.4	- 13.5	- 14.9	- 6.1	+ 6.1	+ 0.9	+ 17.5	+ 23.3	+ 30.8	+ 26.1	+ 24.5
Chandler	1346	+ 5.0	+ 10.0	+ 7.9	+ 6.4	+ 10.2	+ 5.5	+ 28.9	+ 51.3	+ 34.8	+ 9.8	+ 58.8	+ 39.2
Bonnicksen	57306	- 1.3	- 0.1	- 5.2	- 9.2	- 8.8	- 12.1	- 0.8	- 17.2	- 12.4	- 18.0	- 16.3	+ 8.4
Birch and Gaydon	2540	+ 13.0	+ 2.8	+ 5.5	+ 3.9	+ 0.3	+ 6.4	- 18.5	- 42.0	- 15.6	- 49.7	- 42.9	- 19.7
Junner	1863	+ 1.2	+ 2.2	+ 6.5	+ 15.2	+ 6.6	+ 0.9	+ 10.2	+ 10.3	+ 44.8	+ 4.2	+ 17.8	+ 8.1
Chandler	66886	- 3.2	- 2.6	- 0.4	+ 2.1	+ 4.6	+ 3.2	- 19.2	- 2.9	+ 1.4	- 2.1	- 27.2	- 2.1
Usher and Cole	90088	- 2.8	- 2.6	+ 10.0	+ 10.3	+ 10.7	+ 9.0	+ 2.1	- 66.8	+ 12.2	- 84.9	- 70.0	- 2.1
Hewitt	57880	+ 0.4	+ 7.1	- 0.1	- 3.3	+ 1.4	- 5.2	+ 13.2	+ 17.0	- 11.2	+ 1.4	+ 18.8	+ 21.6
L. Hall	1778	- 10.8	- 6.6	- 19.3	- 25.6	- 22.8	- 28.5	+ 8.2	+ 11.0	+ 20.7	+ 12.8	+ 4.2	+ 6.6
Whytock and Son	51614	+ 2.0	- 3.2	- 3.8	- 5.2	- 8.1	- 7.8	+ 21.9	+ 19.4	+ 25.4	+ 32.0	+ 34.8	+ 30.7

Mean Weekly Temperature ... 57.7 60.6 59.0 56.3 56.6 52.8 86.7 82.7 87.5 86.4

Extremes of Temperature as shown by the Self Registering Thermometers 56.2-56.7 56.8-56.6 57.1-51.6 54.6-57.6 54.2-58.0 50.8-57.3 75.0-56.7 75.3-88.2 84.7-95.0 87.2-89.3

* The weekly rates have been computed from the rates for three days.

† The weekly rates have been computed from the rates for five days.

‡ During the period Nov. 9 to Dec. 17, the watches were placed in an oven heated by jets of gas, the temperature being regulated by Kullberg's automatic governor, which controls the supply of gas. The gas flames are exterior to the chamber, into which none of the injurious products of combustion can enter.

§ The weekly rates have been computed from the rates for four days.

ROYAL OBSERVATORY, GREENWICH, FROM 1904 OCTOBER 8 TO 1905 JANUARY 28.

(2) ABSTRACT OF THE PRINCIPAL CHANGES OF RATE.

Dec. 17-24.	Dec. 24-31.	Dec. 31 to Jan. 7.	Jan. 7-14.	Jan. 14-21.	Jan. 21-28.	Difference between greatest and least Weekly Rates.	Greatest difference between one week and the next.	Difference of Weekly Rates.	Total Number.	NAME OF MAKER.	No.			
Watch Horizontal Dial up.						Dial up.	Dial up.	Pendant up - Dial up.	Pendant right - Dial up.	Pendant left - Dial up.	a + 2b + 1/2(c + d + e)			
a	b	c	d	e	f	a	b	c	d	e				
+ 5.0	+ 11.9	+ 18.1	+ 26.2	+ 13.7	+ 19.0	27.5	17.9	+ 29.4	+ 14.6	- 27.4	68.3	85.0	Newcomen and Co.	142004
+ 5.0	- 5.0	+ 0.1	+ 2.9	- 6.9	- 9.2	33.3	17.2	- 0.8	- 38.5	- 64.9	67.7	85.1	Chandler	1348
- 32.9	- 39.0	- 17.7	- 27.3	- 35.5	- 35.8	41.3	21.3	+ 2.6	+ 5.8	- 1.0	49.8	96.3	H. White (Manchester)	90813
- 28.7	- 34.3	- 33.7	- 31.1	- 32.1	- 23.2	32.5	16.7	- 10.7	- 6.9	- 27.9	68.9	87.0	Lilly and Co.	1321
- 11.1	- 6.6	- 3.4	- 6.9	+ 3.1	- 1.7	43.7	16.1	+ 16.9	+ 14.5	+ 14.5	75.9	89.2	Sheffield Gold and Silversmiths Co.	01613
+ 2.1	- 5.3	- 13.2	- 16.9	- 14.0	- 17.0	33.8	11.8	+ 51.0	+ 1.4	- 7.2	62.4	89.3	Newcomen	14703
+ 20.1	+ 16.7	+ 18.1	+ 14.2	+ 14.2	+ 10.6	31.0	24.2	+ 18.4	+ 3.3	- 19.7	79.3	92.4	Hewitt	57881
- 21.3	- 22.9	- 22.8	- 18.3	- 24.7	- 36.1	31.1	24.1	+ 15.5	+ 10.8	- 24.4	79.3	93.0	H. White (Manchester)	1464
- 0.0	+ 1.5	+ 6.5	+ 18.8	+ 14.5	+ 23.6	29.2	25.3	+ 0.9	+ 59.1	- 5.1	81.8	93.0	Usher and Cole	90520
+ 44.9	+ 49.9	+ 26.0	+ 28.8	+ 24.8	+ 25.1	49.1	14.7	+ 23.4	+ 17.4	+ 1.2	78.5	93.3	Yousmans	80983
+ 14.3	+ 7.4	+ 5.9	+ 13.7	+ 5.8	+ 6.8	23.1	29.1	- 8.2	- 7.5	- 5.4	87.9	93.6	Lister and Son	50940
- 2.5	- 7.1	+ 0.8	+ 0.9	- 0.4	+ 1.5	41.7	17.9	+ 25.6	+ 18.6	- 8.5	77.5	94.8	Sewell	43771
+ 4.2	+ 1.7	+ 4.5	- 1.3	- 13.4	- 22.8	33.2	21.8	- 22.7	- 20.8	- 21.0	76.8	95.2	Yousmans	76779
+ 1.1	+ 4.2	+ 11.4	+ 7.5	+ 6.4	+ 1.0	39.4	23.4	+ 9.1	+ 10.6	- 18.1	86.2	95.6	Ritchie and Son	01385
+ 15.6	+ 10.5	+ 13.1	+ 15.9	+ 10.3	+ 8.4	34.2	23.4	+ 21.0	+ 0.7	- 24.3	91.0	95.7	Chandler	1346
- 18.4	- 21.0	- 33.1	- 26.6	- 30.1	- 34.8	38.2	21.8	- 18.1	- 13.7	- 19.3	81.8	96.4	Bonnicksen	57306
- 26.7	- 20.1	- 17.9	- 25.9	- 38.7	- 42.4	55.4	12.1	- 23.4	+ 3.5	- 39.6	79.6	97.0	Birch and Gaydon	2540
- 1.0	- 1.6	- 1.6	- 36.6	- 20.8	- 19.3	48.8	17.8	+ 7.9	- 35.6	+ 19.9	84.4	97.7	Junner	1863
+ 13.7	+ 7.2	+ 7.1	+ 4.8	+ 9.9	+ 6.4	16.5	15.8	+ 28.2	+ 27.6	- 21.1	76.6	97.8	Chandler	66886
- 4.0	- 1.7	- 5.2	- 13.0	- 19.0	- 16.1	39.8	25.6	- 0.5	- 28.6	- 16.0	90.8	98.5	Usher and Cole	90088
+ 6.3	+ 8.4	+ 10.8	+ 18.9	+ 8.4	+ 18.2	47.4	20.3	+ 8.4	+ 30.5	- 12.5	88.0	99.4	Hewitt	57880
+ 13.1	+ 6.2	+ 5.8	+ 8.9	+ 6.2	+ 0.8	35.5	29.7	+ 0.8	- 0.9	+ 5.7	87.0	99.4	L. Hall	1778
55.0	46.8	51.6	52.9	47.1	46.1								Whytock and Son	51614

The sign + indicates a gaining rate.

The quantities a, b, c, d, e in the formula $a + 2b + \frac{1}{2}(c + d + e)$, are taken numerically, without regard to sign.

49.3-58.045-4.3146.8-55.150-1.55-0.041-6.745-56.4

The sign + indicates a gaining rate.

The quantities a, b, c, d, e, in the formula a + 2b + 1/2(c + d + e), are taken numerically, without regard to sign.

Only those watches have been included in this list for which the trial number did not exceed 100.