

Revisions to Workforce Jobs December 2015

Abstract

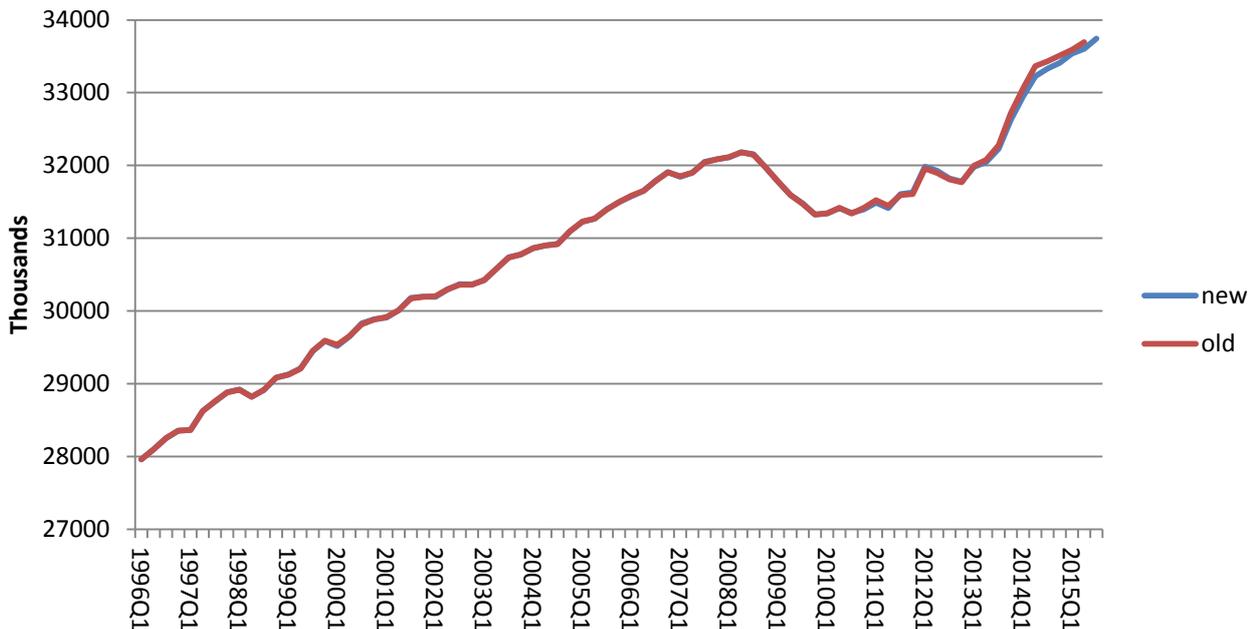
This article explains the improvements and revisions to the Workforce Jobs (WFJ) series, released by the Office for National Statistics (ONS) on 16 December 2015 in the *Labour Market Statistical Bulletin*.

Workforce Jobs is a quarterly measure of the number of jobs in the United Kingdom (UK) and is the preferred measure of the change in jobs by industry. It is a compound source that draws on a range of employer surveys, household surveys and administrative sources. WFJ is the sum of employee jobs (EJ) measured primarily by employer surveys (predominantly the Short-Term Employment Surveys (STES) and the Quarterly Public Sector Employment Survey (QPSES)), self-employment jobs (SEJ) from the Labour Force Survey (LFS), and government-supported trainees (GST) and Her Majesty's Forces (HMF) from administrative sources (see **Annex A**). A variety of outputs by industry, region, gender and full/part-time status are produced for a range of publications and users.

This article explains, in detail, the revisions that have been made to the WFJ series since December 2014 as a result of:

- benchmarking to the latest estimates from the annual Business Register and Employment Survey (BRES); these revisions will go back to 2011,
- changes to seasonal parameters following a seasonal adjustment review; these revisions will go back to 1981,
- revisions of PSE estimates at Q3 2015 which were applied to Workforce Jobs inputs,
- revisions to STES for periods Q2 2014 onwards, due to updates in data supplied or late data, have now been included,
- small revisions back to 2008 caused by a refinement in benchmarking methodology.

Figure 1 compares the previously published and revised UK Workforce jobs (seasonally adjusted).

Figure 1 Previously published versus revised UK seasonally adjusted Workforce jobs

Benchmarking GB Employee Jobs to the Business Register Employment Survey

Benchmarking is an annual process to align the quarterly GB EJ series to the latest estimates from the Business Register and Employment Survey (BRES). BRES is based on a sample of approximately 80,000 reporting units¹, a much larger sample than STES, and so generally is considered to produce more accurate and detailed estimates of the level of employment. BRES estimates refer to Q3 of a given year. The private sector element of GB EJ series has been benchmarked to the equivalent from BRES for the periods Q3 2013 and Q3 2014 (the latest period available).

Changes to estimates of Public Sector Employment

Workforce Jobs makes use of ONS's official public sector employment (PSE) estimates for GB. These inputs are not benchmarked as they are the definitive measure of PSE. PSE estimates were revised at Q3 2015 and these revisions have been applied to WFJ inputs. Further information is available in the Q3 2015 PSE Statistical Bulletin. <http://www.ons.gov.uk/ons/rel/pse/public-sector-employment/q3-2014/index.html>

¹ Reporting units hold the mailing address to which survey forms are sent. The form can cover the enterprise as a whole, or parts of the enterprise identified by lists of local units.

Late or revised data

The private sector employee jobs data comes from sample surveys. Each quarter revisions to data supplied or late data are incorporated for the previous quarter in line with the revisions policy. Revisions or late data for earlier periods (Q2 2014 onwards) have now been included.

Seasonal Adjustment

Seasonal adjustment is the process of identifying and removing the seasonal components from a series to leave the underlying trend and irregular components. The revised WFJ series have undergone a seasonal adjustment review, by ONS's Time Series Analysis branch, causing revisions back to Q3 1981.

Government Supported trainees (GSTs)

The Department for Business, Innovation and Skills (BIS) and the devolved administrations provide the information for these series and small revisions have been taken on.

Northern Ireland jobs

Employee jobs estimates for Northern Ireland are provided by the Department of Finance and Personnel - Northern Ireland (DFPNI). Small revisions have been taken on.

References

1. 'Public Sector Employment, Q3 2015'

<http://www.ons.gov.uk/ons/rel/pse/public-sector-employment/q3-2014/index.html>

Useful links

Estimates of sampling variability for Workforce Jobs:

<http://www.ons.gov.uk/ons/rel/lms/labour-market-statistics/november-2015/table-jobs07.xls>

Quality and Methodology information report for Workforce Jobs. Available at:

<http://www.ons.gov.uk/ons/guide-method/method-quality/quality/quality-information/labour-market/index.html>

Hess S and Smith, J (2013) 'Revisions to Workforce Jobs – April 2013.' Available at:

<http://www.ons.gov.uk/ons/guide-method/method-quality/specific/labour-market/articles-and-reports/index.html>

Hess S (2013) 'Estimates of sampling variability for Workforce Jobs'. Available at:

<http://www.ons.gov.uk/ons/guide-method/method-quality/specific/labour-market/articles-and-reports/index.html>

Matthews D and Hess S (2012) 'Revision to Workforce Jobs - March 2012'. Available at: <http://www.ons.gov.uk/ons/guide-method/method-quality/specific/labour-market/articles-and-reports/revisions-to-workforce-jobs-march-2012.pdf>

Barford N (2010) 'Revisions to Workforce Jobs', Economic & Labour Market Review, Vol 4 No 9. Available at: <http://www.ons.gov.uk/ons/rel/wfj/workforce-jobs/revisions-to-workforce-jobs---july-2010/revisions-to-workforce-jobs--july-2010.pdf>

Annex A – Workforce Jobs sources

Component		Source
Employee Jobs		
Great Britain	Private Sector	Short Term Employer Surveys (STES), benchmarked to the Business Register Employment Survey (BRES)
	Public Sector	Public Sector Employment (PSE) from Quarterly Public Sector Employment Surveys (QPSES) and administrative sources from other government departments and devolved administrations
	Agriculture	Labour Force Survey (LFS), benchmarked to BRES
	Construction	Short Term Employer Surveys (STES), benchmarked to the Business Register Employment Survey (BRES)
	Air transport	Civil Aviation Authority (CAA), benchmarked to BRES
Northern Ireland	Department of Finance and Personnel – Northern Ireland (DFPNI)	
Self-Employed Jobs		Labour Force Survey (LFS) - main and second jobs by industry by region
Government Supported Trainees		
England	Department for Business, Innovation and Skills (BIS), split by industry using LFS	
Wales	Welsh Government (WG), split by industry using LFS	
Scotland	Scottish Government (SG), split by industry using LFS	
Northern Ireland	Department of Finance and Personnel – Northern Ireland (DFPNI), split by industry using LFS	
Her Majesty's Forces		Defence Analytical Services and Advice (DASA)

Annex B – Revision tables, Workforce Jobs by Component

United Kingdom			Thousands and per cent, seasonally adjusted												
Workforce Jobs			Employee jobs			Self-employment jobs			HM Forces			Government-supported trainees			
Revised level	Change	Change	Revised level	Change	Change	Revised level	Change	Change	Revised level	Change	Change	Revised level	Change	Change	
(000s)	(000s)	per cent	(000s)	(000s)	per cent	(000s)	(000s)	per cent	(000s)	(000s)	per cent	(000s)	(000s)	per cent	
Jun-59	25436	0	0.00	23006	0	0.00	1835	0	0.00	595	0	0.00	0	0	-
Sep-59	25540	0	0.00	23129	0	0.00	1834	0	0.00	577	0	0.00	0	0	-
Dec-59	25631	0	0.00	23250	0	0.00	1820	0	0.00	560	0	0.00	0	0	-
Mar-60	25784	0	0.00	23410	0	0.00	1824	0	0.00	550	0	0.00	0	0	-
Jun-60	25894	0	0.00	23513	0	0.00	1840	0	0.00	541	0	0.00	0	0	-
Sep-60	25939	0	0.00	23563	0	0.00	1839	0	0.00	536	0	0.00	0	0	-
Dec-60	26123	0	0.00	23771	0	0.00	1827	0	0.00	526	0	0.00	0	0	-
Mar-61	26222	0	0.00	23888	0	0.00	1827	0	0.00	507	0	0.00	0	0	-
Jun-61	26189	0	0.00	23862	0	0.00	1832	0	0.00	495	0	0.00	0	0	-
Sep-61	26251	0	0.00	23942	0	0.00	1824	0	0.00	485	0	0.00	0	0	-
Dec-61	26177	0	0.00	23890	0	0.00	1812	0	0.00	475	0	0.00	0	0	-
Mar-62	26326	0	0.00	24051	0	0.00	1809	0	0.00	466	0	0.00	0	0	-
Jun-62	26382	0	0.00	24090	0	0.00	1830	0	0.00	462	0	0.00	0	0	-
Sep-62	26360	0	0.00	24084	0	0.00	1821	0	0.00	456	0	0.00	0	0	-
Dec-62	26291	0	0.00	24028	0	0.00	1810	0	0.00	453	0	0.00	0	0	-
Mar-63	26205	0	0.00	23951	0	0.00	1803	0	0.00	451	0	0.00	0	0	-
Jun-63	26417	0	0.00	24147	0	0.00	1824	0	0.00	446	0	0.00	0	0	-
Sep-63	26440	0	0.00	24179	0	0.00	1818	0	0.00	443	0	0.00	0	0	-
Dec-63	26582	0	0.00	24332	0	0.00	1807	0	0.00	442	0	0.00	0	0	-
Mar-64	26633	0	0.00	24391	0	0.00	1799	0	0.00	443	0	0.00	0	0	-
Jun-64	26735	0	0.00	24472	0	0.00	1819	0	0.00	443	0	0.00	0	0	-
Sep-64	26857	0	0.00	24593	0	0.00	1822	0	0.00	442	0	0.00	0	0	-
Dec-64	26934	0	0.00	24683	0	0.00	1807	0	0.00	444	0	0.00	0	0	-
Mar-65	26989	0	0.00	24747	0	0.00	1799	0	0.00	443	0	0.00	0	0	-
Jun-65	27018	0	0.00	24762	0	0.00	1814	0	0.00	442	0	0.00	0	0	-
Sep-65	27038	0	0.00	24771	0	0.00	1826	0	0.00	440	0	0.00	0	0	-
Dec-65	27157	0	0.00	24915	0	0.00	1803	0	0.00	439	0	0.00	0	0	-
Mar-66	27203	0	0.00	24971	0	0.00	1795	0	0.00	437	0	0.00	0	0	-
Jun-66	27195	0	0.00	24951	0	0.00	1808	0	0.00	436	0	0.00	0	0	-
Sep-66	27202	0	0.00	24917	0	0.00	1850	0	0.00	435	0	0.00	0	0	-
Dec-66	26956	0	0.00	24670	0	0.00	1848	0	0.00	438	0	0.00	0	0	-
Mar-67	26806	0	0.00	24500	0	0.00	1868	0	0.00	438	0	0.00	0	0	-
Jun-67	26832	0	0.00	24497	0	0.00	1899	0	0.00	436	0	0.00	0	0	-
Sep-67	26871	0	0.00	24508	0	0.00	1931	0	0.00	432	0	0.00	0	0	-
Dec-67	26748	0	0.00	24405	0	0.00	1913	0	0.00	431	0	0.00	0	0	-
Mar-68	26704	0	0.00	24363	0	0.00	1915	0	0.00	425	0	0.00	0	0	-
Jun-68	26682	0	0.00	24332	0	0.00	1932	0	0.00	418	0	0.00	0	0	-
Sep-68	26708	0	0.00	24329	0	0.00	1966	0	0.00	413	0	0.00	0	0	-
Dec-68	26718	0	0.00	24343	0	0.00	1967	0	0.00	408	0	0.00	0	0	-
Mar-69	26711	0	0.00	24326	0	0.00	1983	0	0.00	401	0	0.00	0	0	-
Jun-69	26717	0	0.00	24310	0	0.00	2010	0	0.00	397	0	0.00	0	0	-
Sep-69	26716	0	0.00	24289	0	0.00	2033	0	0.00	394	0	0.00	0	0	-
Dec-69	26686	0	0.00	24257	0	0.00	2036	0	0.00	393	0	0.00	0	0	-
Mar-70	26718	0	0.00	24273	0	0.00	2055	0	0.00	391	0	0.00	0	0	-
Jun-70	26622	0	0.00	24164	0	0.00	2069	0	0.00	389	0	0.00	0	0	-
Sep-70	26568	0	0.00	24138	0	0.00	2043	0	0.00	387	0	0.00	0	0	-
Dec-70	26507	0	0.00	24100	0	0.00	2019	0	0.00	388	0	0.00	0	0	-
Mar-71	26304	0	0.00	23824	0	0.00	2094	0	0.00	386	0	0.00	0	0	-
Jun-71	26285	0	0.00	23812	0	0.00	2088	0	0.00	385	0	0.00	0	0	-
Sep-71	26097	0	0.00	23630	0	0.00	2082	0	0.00	385	0	0.00	0	0	-
Dec-71	26083	0	0.00	23618	0	0.00	2077	0	0.00	389	0	0.00	0	0	-
Mar-72	26279	0	0.00	23798	0	0.00	2093	0	0.00	388	0	0.00	0	0	-
Jun-72	26273	0	0.00	23814	0	0.00	2071	0	0.00	388	0	0.00	0	0	-
Sep-72	26391	0	0.00	23920	0	0.00	2078	0	0.00	392	0	0.00	0	0	-
Dec-72	26564	0	0.00	24082	0	0.00	2092	0	0.00	389	0	0.00	0	0	-
Mar-73	26909	0	0.00	24400	0	0.00	2125	0	0.00	384	0	0.00	0	0	-
Jun-73	26897	0	0.00	24406	0	0.00	2114	0	0.00	377	0	0.00	0	0	-
Sep-73	26929	0	0.00	24451	0	0.00	2104	0	0.00	374	0	0.00	0	0	-
Dec-73	26956	0	0.00	24487	0	0.00	2099	0	0.00	370	0	0.00	0	0	-
Mar-74	26929	0	0.00	24452	0	0.00	2112	0	0.00	365	0	0.00	0	0	-
Jun-74	26986	0	0.00	24542	0	0.00	2084	0	0.00	361	0	0.00	0	0	-
Sep-74	27084	0	0.00	24637	0	0.00	2084	0	0.00	363	0	0.00	0	0	-
Dec-74	27027	0	0.00	24584	0	0.00	2085	0	0.00	359	0	0.00	0	0	-
Mar-75	26939	0	0.00	24483	0	0.00	2103	0	0.00	353	0	0.00	0	0	-
Jun-75	26896	0	0.00	24457	0	0.00	2088	0	0.00	351	0	0.00	0	0	-
Sep-75	26828	0	0.00	24400	0	0.00	2073	0	0.00	355	0	0.00	0	0	-
Dec-75	26755	0	0.00	24322	0	0.00	2079	0	0.00	354	0	0.00	0	0	-
Mar-76	26678	0	0.00	24272	0	0.00	2054	0	0.00	352	0	0.00	0	0	-
Jun-76	26659	0	0.00	24256	0	0.00	2052	0	0.00	351	0	0.00	0	0	-
Sep-76	26650	0	0.00	24266	0	0.00	2030	0	0.00	353	0	0.00	0	0	-
Dec-76	26691	0	0.00	24302	0	0.00	2039	0	0.00	349	0	0.00	0	0	-
Mar-77	26697	0	0.00	24327	0	0.00	2026	0	0.00	345	0	0.00	0	0	-
Jun-77	26697	0	0.00	24340	0	0.00	2015	0	0.00	342	0	0.00	0	0	-
Sep-77	26720	0	0.00	24361	0	0.00	2017	0	0.00	343	0	0.00	0	0	-
Dec-77	26747	0	0.00	24369	0	0.00	2039	0	0.00	339	0	0.00	0	0	-
Mar-78	26817	0	0.00	24442	0	0.00	2040	0	0.00	336	0	0.00	0	0	-
Jun-78	26862	0	0.00	24506	0	0.00	2023	0	0.00	332	0	0.00	0	0	-
Sep-78	26964	0	0.00	24604	0	0.00	2026	0	0.00	335	0	0.00	0	0	-
Dec-78	27146	0	0.00	24786	0	0.00	2028	0	0.00	331	0	0.00	0	0	-
Mar-79	27174	0	0.00	24817	0	0.00	2028	0	0.00	329	0	0.00	0	0	-

Jun-79	27283	0	0.00	24926	0	0.00	2029	0	0.00	328	0	0.00	0	0	-
Sep-79	27362	0	0.00	24969	0	0.00	2060	0	0.00	333	0	0.00	0	0	-
Dec-79	27411	0	0.00	24988	0	0.00	2090	0	0.00	333	0	0.00	0	0	-
Mar-80	27334	0	0.00	24879	0	0.00	2120	0	0.00	336	0	0.00	0	0	-
Jun-80	27239	0	0.00	24749	0	0.00	2152	0	0.00	338	0	0.00	0	0	-
Sep-80	26978	0	0.00	24451	0	0.00	2180	0	0.00	347	0	0.00	0	0	-
Dec-80	26686	0	0.00	24126	0	0.00	2210	0	0.00	349	0	0.00	0	0	-
Mar-81	26425	0	0.00	23836	0	0.00	2240	0	0.00	349	0	0.00	0	0	-
Jun-81	26223	0	0.00	23603	0	0.00	2271	0	0.00	349	0	0.00	0	0	-
Sep-81	26128	0	0.00	23494	1	0.00	2285	0	0.00	350	0	0.00	0	0	-
Dec-81	25922	0	0.00	23277	0	0.00	2298	0	0.00	347	0	0.00	0	0	-
Mar-82	25861	0	0.00	23207	-1	0.00	2311	0	0.00	343	0	0.00	0	0	-
Jun-82	25766	0	0.00	23104	0	0.00	2324	0	0.00	339	0	0.00	0	0	-
Sep-82	25670	1	0.00	22995	0	0.00	2337	0	0.00	338	0	0.00	0	0	-
Dec-82	25465	0	0.00	22780	0	0.00	2350	0	0.00	336	0	0.00	0	0	-
Mar-83	25395	0	0.00	22687	-1	0.00	2363	0	0.00	336	0	0.00	9	0	0.00
Jun-83	25461	0	0.00	22733	0	0.00	2376	0	0.00	337	0	0.00	16	0	0.00
Sep-83	25759	0	0.00	22848	1	0.00	2449	0	0.00	340	0	0.00	123	0	0.00
Dec-83	25918	0	0.00	22879	0	0.00	2523	0	0.00	340	0	0.00	176	0	0.00
Mar-84	26044	0	0.00	22912	0	0.00	2597	0	0.00	341	0	0.00	194	0	0.00
Jun-84	26160	0	0.00	22958	0	0.00	2670	0	0.00	341	0	0.00	191	0	0.00
Sep-84	26293	0	0.00	23064	1	0.00	2695	0	0.00	343	0	0.00	192	0	0.00
Dec-84	26378	-1	0.00	23117	-1	0.00	2720	0	0.00	342	0	0.00	199	0	0.00
Mar-85	26425	0	0.00	23130	-1	0.00	2745	0	0.00	341	0	0.00	208	0	0.00
Jun-85	26473	0	0.00	23169	0	0.00	2772	0	0.00	341	0	0.00	191	0	0.00
Sep-85	26551	0	0.00	23225	0	0.00	2780	0	0.00	340	0	0.00	206	0	0.00
Dec-85	26524	0	0.00	23189	0	0.00	2789	0	0.00	338	0	0.00	209	0	0.00
Mar-86	26477	0	0.00	23134	0	0.00	2797	0	0.00	337	0	0.00	209	0	0.00
Jun-86	26522	0	0.00	23140	0	0.00	2807	0	0.00	336	0	0.00	239	0	0.00
Sep-86	26636	0	0.00	23178	0	0.00	2858	0	0.00	337	0	0.00	262	0	0.00
Dec-86	26687	0	0.00	23172	0	0.00	2909	0	0.00	335	0	0.00	271	0	0.00
Mar-87	26747	0	0.00	23181	0	0.00	2960	0	0.00	334	0	0.00	272	0	0.00
Jun-87	27048	0	0.00	23375	0	0.00	3018	0	0.00	333	0	0.00	321	0	0.00
Sep-87	27345	1	0.00	23581	0	0.00	3067	0	0.00	334	0	0.00	363	0	0.00
Dec-87	27599	0	0.00	23790	0	0.00	3115	0	0.00	332	0	0.00	362	0	0.00
Mar-88	27809	0	0.00	23956	-1	0.00	3164	0	0.00	331	0	0.00	358	0	0.00
Jun-88	28016	0	0.00	24120	0	0.00	3216	0	0.00	330	0	0.00	350	0	0.00
Sep-88	28304	0	0.00	24333	1	0.00	3290	0	0.00	329	0	0.00	352	0	0.00
Dec-88	28502	0	0.00	24404	0	0.00	3365	0	0.00	327	0	0.00	405	0	0.00
Mar-89	28797	0	0.00	24571	0	0.00	3439	0	0.00	326	0	0.00	461	0	0.00
Jun-89	28902	0	0.00	24602	0	0.00	3511	0	0.00	322	0	0.00	467	0	0.00
Sep-89	29018	0	0.00	24721	0	0.00	3521	0	0.00	322	0	0.00	454	0	0.00
Dec-89	29120	0	0.00	24821	0	0.00	3530	0	0.00	320	0	0.00	448	0	0.00
Mar-90	29134	0	0.00	24845	0	0.00	3540	0	0.00	320	0	0.00	430	0	0.00
Jun-90	29215	0	0.00	24905	0	0.00	3554	0	0.00	317	0	0.00	438	0	0.00
Sep-90	29123	0	0.00	24875	0	0.00	3516	0	0.00	317	0	0.00	415	0	0.00
Dec-90	28899	1	0.00	24700	0	0.00	3478	0	0.00	314	0	0.00	407	0	0.00
Mar-91	28581	0	0.00	24427	0	0.00	3440	0	0.00	314	0	0.00	400	0	0.00
Jun-91	28300	0	0.00	24216	0	0.00	3404	0	0.00	311	0	0.00	369	0	0.00
Sep-91	28141	0	0.00	24101	0	0.00	3390	0	0.00	310	0	0.00	340	0	0.00
Dec-91	27987	0	0.00	23959	0	0.00	3375	0	0.00	310	0	0.00	343	0	0.00
Mar-92	27973	-1	0.00	23948	-1	0.00	3361	0	0.00	308	0	0.00	357	0	0.00
Jun-92	27818	0	0.00	23822	0	0.00	3351	0	0.00	304	0	0.00	340	0	0.00
Sep-92	27422	0	0.00	23480	0	0.00	3324	0	0.00	300	0	0.00	319	0	0.00
Dec-92	27277	0	0.00	23392	0	0.00	3246	0	0.00	294	0	0.00	344	0	0.00
Mar-93	27391	0	0.00	23408	0	0.00	3345	0	0.00	290	0	0.00	348	0	0.00
Jun-93	27374	0	0.00	23440	0	0.00	3323	0	0.00	285	0	0.00	326	0	0.00
Sep-93	27440	0	0.00	23518	-1	0.00	3334	0	0.00	279	0	0.00	308	0	0.00
Dec-93	27510	0	0.00	23529	0	0.00	3392	0	0.00	271	0	0.00	318	0	0.00
Mar-94	27491	0	0.00	23494	0	0.00	3412	0	0.00	268	0	0.00	318	0	0.00
Jun-94	27535	0	0.00	23535	0	0.00	3421	0	0.00	262	0	0.00	317	0	0.00
Sep-94	27729	0	0.00	23727	-1	0.00	3454	0	0.00	258	0	0.00	290	0	0.00
Dec-94	27802	1	0.00	23781	0	0.00	3486	0	0.00	249	0	0.00	286	0	0.00
Mar-95	27793	0	0.00	23798	0	0.00	3485	0	0.00	245	0	0.00	265	0	0.00
Jun-95	27899	0	0.00	23921	0	0.00	3497	0	0.00	241	0	0.00	240	0	0.00
Sep-95	27900	-1	0.00	23938	-1	0.00	3503	0	0.00	238	0	0.00	222	0	0.00
Dec-95	28047	0	0.00	24112	0	0.00	3482	0	0.00	236	0	0.00	217	0	0.00
Mar-96	27963	1	0.00	24072	1	0.00	3443	0	0.00	234	0	0.00	214	0	0.00
Jun-96	28101	1	0.00	24234	0	0.00	3454	0	0.00	230	0	0.00	183	0	0.00
Sep-96	28253	-1	0.00	24346	-1	0.00	3491	0	0.00	227	0	0.00	189	0	0.00
Dec-96	28355	0	0.00	24471	0	0.00	3470	0	0.00	225	0	0.00	189	0	0.00
Mar-97	28364	1	0.00	24560	1	0.00	3406	0	0.00	223	0	0.00	175	0	0.00
Jun-97	28626	1	0.00	24843	1	0.00	3404	0	0.00	220	0	0.00	160	0	0.00
Sep-97	28757	-3	-0.01	24969	-2	-0.01	3395	0	0.00	223	0	0.00	171	0	0.00
Dec-97	28883	1	0.00	25131	1	0.00	3370	0	0.00	220	0	0.00	162	0	0.00
Mar-98	28921	2	0.01	25210	2	0.01	3338	0	0.00	219	0	0.00	153	0	0.00
Jun-98	28822	1	0.00	25196	1	0.00	3284	0	0.00	219	0	0.00	123	0	0.00
Sep-98	28913	-4	-0.01	25302	-4	-0.02	3261	0	0.00	219	0	0.00	132	0	0.00
Dec-98	29086	1	0.00	25452	1	0.00	3290	0	0.00	219	0	0.00	126	0	0.00
Mar-99	29128	3	0.01	25530	3	0.01	3256	0	0.00	218	0	0.00	124	0	0.00
Jun-99	29210	1	0.00	25589	2	0.01	3280	0	0.00	218	0	0.00	124	0	0.00
Sep-99	29450	-4	-0.01	25844	-4	-0.02	3257	0	0.00	218	0	0.00	131	0	0.00
Dec-99	29591	-1	0.00	25994	0	0.00	3252	0	0.00	217	0	0.00	128	0	0.00
Mar-00	29520	-15	-0.05	25975	-15	-0.06	3206	0	0.00	217	0	0.00	122	0	0.00
Jun-00	29651	-3	-0.01	26145	-3	-0.01	3176	0	0.00	217	0	0.00	113	0	0.00
Sep-00	29830	12	0.04	26309	12	0.05	3184	0	0.00	215	0	0.00	122	0	0.00
Dec-00	29888	5	0.02	26372	5	0.02	3183	0	0.00	216	0	0.00	118	0	0.00
Mar-01	29908	-12	-0.04	26399	-13	-0.05	3183	0	0.00	215	0	0.00	110	0	0.00
Jun-01	30011	-1	0.00	26504	-1	0.00	3198	0	0.00	214	0	0.00	95	0	0.00
Sep-01	30181	9	0.03	26685	9	0.03	3193	0	0.00	214	0	0.00	90	1	1.12
Dec-01	30199	4	0.01	26698	4	0.02	3197	0	0.00	214	0	0.00	90	0	0.00
Mar-02	30194	-9	-0.03	26698	-9	-0.03	3193	0	0.00	215	0	0.00	88	0	0.00
Jun-02	30297	-1	0.00	26728	-1	0.00</									

Dec-02	30366	3	0.01	26794	4	0.02	3284	0	0.00	216	0	0.00	73	0	0.00
Mar-03	30422	-7	-0.02	26752	-7	-0.03	3375	0	0.00	221	0	0.00	73	-1	-1.35
Jun-03	30580	0	0.00	26842	0	0.00	3446	0	0.00	223	0	0.00	70	0	0.00
Sep-03	30739	5	0.02	26902	5	0.02	3537	0	0.00	222	0	0.00	79	0	0.00
Dec-03	30778	1	0.00	26966	2	0.01	3512	0	0.00	221	0	0.00	79	0	0.00
Mar-04	30861	-6	-0.02	27047	-5	-0.02	3517	0	0.00	220	0	0.00	78	0	0.00
Jun-04	30901	0	0.00	27095	0	0.00	3515	0	0.00	218	0	0.00	72	0	0.00
Sep-04	30923	4	0.01	27152	4	0.02	3484	0	0.00	216	0	0.00	71	0	0.00
Dec-04	31094	1	0.00	27313	2	0.01	3495	0	0.00	214	0	0.00	73	0	0.00
Mar-05	31225	-6	-0.02	27446	-6	-0.02	3495	0	0.00	212	0	0.00	72	1	1.41
Jun-05	31270	0	0.00	27496	0	0.00	3498	0	0.00	210	0	0.00	67	0	0.00
Sep-05	31398	2	0.01	27591	3	0.01	3531	0	0.00	208	0	0.00	69	0	0.00
Dec-05	31499	3	0.01	27648	2	0.01	3576	0	0.00	206	0	0.00	69	0	0.00
Mar-06	31577	-6	-0.02	27700	-5	-0.02	3608	0	0.00	205	0	0.00	64	0	0.00
Jun-06	31653	1	0.00	27808	0	0.00	3587	0	0.00	204	0	0.00	54	0	0.00
Sep-06	31790	3	0.01	27873	2	0.01	3659	0	0.00	202	0	0.00	56	0	0.00
Dec-06	31910	3	0.01	27959	2	0.01	3692	0	0.00	202	0	0.00	56	0	0.00
Mar-07	31846	-6	-0.02	27905	-6	-0.02	3688	-1	-0.03	199	0	0.00	53	0	0.00
Jun-07	31900	0	0.00	27965	0	0.00	3691	0	0.00	198	0	0.00	47	0	0.00
Sep-07	32048	5	0.02	28082	5	0.02	3721	0	0.00	194	0	0.00	51	0	0.00
Dec-07	32086	1	0.00	28123	2	0.01	3716	0	0.00	195	0	0.00	53	0	0.00
Mar-08	32111	-5	-0.02	28151	-5	-0.02	3715	-1	-0.03	194	0	0.00	51	0	0.00
Jun-08	32181	-2	-0.01	28220	-1	0.00	3719	0	0.00	193	0	0.00	50	0	0.00
Sep-08	32155	7	0.02	28219	6	0.02	3690	0	0.00	194	0	0.00	52	0	0.00
Dec-08	31973	0	0.00	27997	1	0.00	3729	0	0.00	193	0	0.00	53	0	0.00
Mar-09	31777	-4	-0.01	27787	-4	-0.01	3738	-1	-0.03	196	0	0.00	56	0	0.00
Jun-09	31594	-1	0.00	27617	-1	0.00	3723	0	0.00	197	0	0.00	57	0	0.00
Sep-09	31478	7	0.02	27444	6	0.02	3777	0	0.00	199	0	0.00	57	0	0.00
Dec-09	31324	-3	-0.01	27305	-3	-0.01	3762	1	0.03	199	0	0.00	59	0	0.00
Mar-10	31338	-5	-0.02	27240	-4	-0.02	3834	0	0.00	199	0	0.00	66	0	0.00
Jun-10	31413	-5	-0.02	27272	-5	-0.02	3881	1	0.03	197	0	0.00	63	0	0.00
Sep-10	31348	8	0.03	27217	7	0.03	3882	0	0.00	196	0	0.00	53	0	0.00
Dec-10	31397	-20	-0.06	27182	-21	-0.08	3970	0	0.00	195	0	0.00	50	0	0.00
Mar-11	31489	-35	-0.11	27307	-35	-0.13	3954	0	0.00	194	0	0.00	35	0	0.00
Jun-11	31415	-28	-0.09	27224	-28	-0.10	3969	0	0.00	193	0	0.00	30	0	0.00
Sep-11	31605	10	0.03	27260	10	0.04	4133	0	0.00	191	0	0.00	21	0	0.00
Dec-11	31628	19	0.06	27334	19	0.07	4082	0	0.00	190	0	0.00	22	0	0.00
Mar-12	31984	26	0.08	27593	26	0.09	4184	0	0.00	187	0	0.00	21	1	5.00
Jun-12	31926	29	0.09	27482	29	0.11	4239	0	0.00	186	0	0.00	19	0	0.00
Sep-12	31822	12	0.04	27390	13	0.05	4230	-1	-0.02	183	0	0.00	19	0	0.00
Dec-12	31778	10	0.03	27421	12	0.04	4159	-1	-0.02	179	0	0.00	19	0	0.00
Mar-13	31981	-15	-0.05	27596	-16	-0.06	4186	0	0.00	178	0	0.00	20	0	0.00
Jun-13	32045	-31	-0.10	27687	-30	-0.11	4165	0	0.00	175	0	0.00	18	0	0.00
Sep-13	32228	-52	-0.16	27768	-51	-0.18	4267	-1	-0.02	173	0	0.00	20	0	0.00
Dec-13	32628	-93	-0.28	27987	-91	-0.32	4453	-2	-0.05	168	0	0.00	20	0	0.00
Mar-14	32950	-110	-0.33	28219	-113	-0.40	4544	2	0.04	167	0	0.00	20	0	0.00
Jun-14	33226	-138	-0.41	28495	-138	-0.48	4546	0	0.00	164	0	0.00	21	0	0.00
Sep-14	33329	-105	-0.31	28631	-107	-0.37	4512	-2	-0.04	163	0	0.00	23	3	15.00
Dec-14	33411	-102	-0.30	28761	-106	-0.37	4467	1	0.02	162	0	0.00	21	3	16.67
Mar-15	33538	-54	-0.16	28987	-54	-0.19	4369	0	0.00	161	0	0.00	21	0	0.00
Jun-15	33601	-93	-0.28	29040	-92	-0.32	4380	0	0.00	159	0	0.00	22	0	0.00