GooglePrice

How to use Google Finance as a share price source for Excel and LibreOffice spreadsheets

Many investors have their own spreadsheets for monitoring their investments. Getting prices for shares is usually the biggest problem. A number of tools exist to download share prices from Yahoo (mostly using Excel), and this is usually quite satisfactory most of the time. Occasionally, Yahoo does have problems which may last for several days, and the share prices may have doubtful validity. Share prices can usually be scraped from various websites, but this is usually on a share-by-share basis and is not easy for those without significant programming skills.

Google provides share price information but this is only available in Google Docs. The spreadsheet in Google Docs is very capable indeed, and is more than adequate for many people. However, Google Docs does not have the power and sophistication of spreadsheets such as Excel or LibreOffice.

This document describes a simple technique for automatically importing and refreshing share and index prices from Google Docs into Excel or LibreOffice spreadsheets, without requiring any great technical skill. Prices are automatically updated every few minutes.

There are two steps to the process:

1. Create a Google Docs spreadsheet containing all of the relevant shares and indices, and configure it appropriately
2. Configure an Excel or LibreOffice spreadsheet to import the data from the Google Docs spreadsheet and automatically refresh the data at intervals

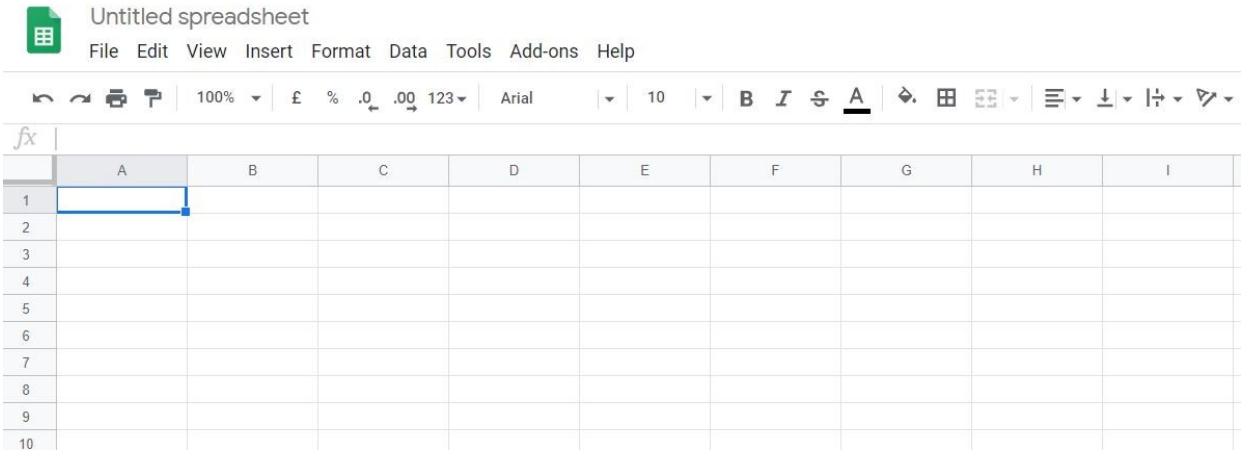
Google Docs spreadsheet

If you don't already have a Google account, set one up here:
https://accounts.google.com/signup/v2/webcreateaccount?flowName=GlifWebSignIn&flowEntry=SignUp

1. In your web browser, access your Google Drive account at: https://drive.google.com/

2. In Drive, select NEW / GOOGLE SHEETS / BLANK SPREADSHEET

3. FILE / RENAME and define a suitable name for the spreadsheet. You should then have a blank spreadsheet like this:



4. (optional) In cell A1, type in the formula =NOW()
   This will show the current date-time. It is not required but is useful as an indicator that the spreadsheet is updating

5. (optional) In row 2, type in the column headers. Not required but allows easier interpretation of the data in subsequent rows

6. In cell A3, type the Google Finance descriptor for the share. For example, for BT, type LON:BT.A

7. (optional) In cell B3, type in the EPIC symbol for the share, such as BT.A
   This can be useful when the data is used in an Excel or LibreOffice VLOOKUP function

8. (optional) In cell C3, type in the Yahoo symbol for the share, such as BT-A.L
   This can be useful when the data is used in an Excel or LibreOffice VLOOKUP function

9. In cell D3, type in the Google Finance function =googlefinance(A3,"price")
   This is the key element, producing the latest price for the share in cell A3

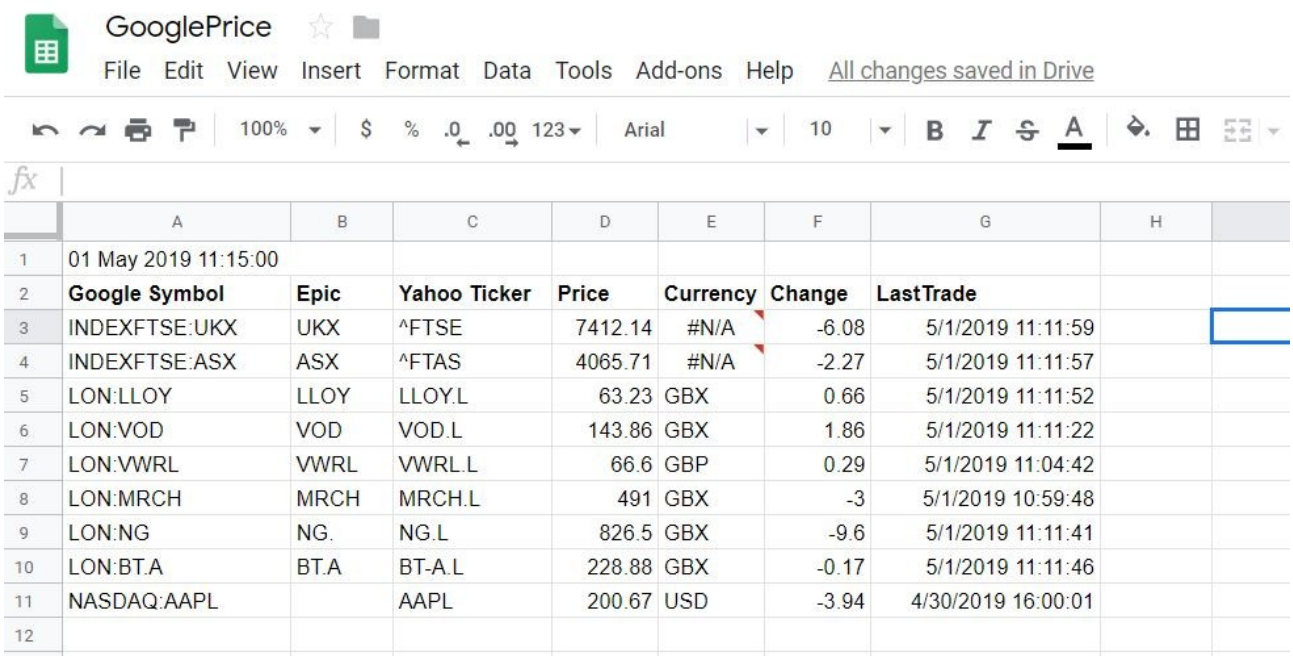
10. (optional) In cell E3, type the Google Finance function =googlefinance(A3,"currency")
    This provides the currency for the price in cell D3, typically GBX (pence) or GBP (pounds)

11. (optional) In cell F3, type the Google Finance function =googlefinance(A3,"change")
    This displays the price change since the previous day's close

12. (optional) In cell G3, type the Google Finance function =googlefinance(A3,"tradetime")
    This displays the timestamp of the last trade. It is useful as a means of verifying that the data is being refreshed from time to time

13. (optional) Repeat steps 6-12 in rows 4 onwards for additional shares or indices

An example of a Google Docs spreadsheet is shown here:



	A	B	C	D	E	F	G	H
1	01 May 2019 11:15:00							
2	**Google Symbol**	**Epic**	**Yahoo Ticker**	**Price**	**Currency**	**Change**	**LastTrade**	
3	INDEXFTSE:UKX	UKX	^FTSE	7412.14	#N/A	-6.08	5/1/2019 11:11:59	
4	INDEXFTSE:ASX	ASX	^FTAS	4065.71	#N/A	-2.27	5/1/2019 11:11:57	
5	LON:LLOY	LLOY	LLOY.L	63.23	GBX	0.66	5/1/2019 11:11:52	
6	LON:VOD	VOD	VOD.L	143.86	GBX	1.86	5/1/2019 11:11:22	
7	LON:VWRL	VWRL	VWRL.L	66.6	GBP	0.29	5/1/2019 11:04:42	
8	LON:MRCH	MRCH	MRCH.L	491	GBX	-3	5/1/2019 10:59:48	
9	LON:NG	NG.	NG.L	826.5	GBX	-9.6	5/1/2019 11:11:41	
10	LON:BT.A	BT.A	BT-A.L	228.88	GBX	-0.17	5/1/2019 11:11:46	
11	NASDAQ:AAPL		AAPL	200.67	USD	-3.94	4/30/2019 16:00:01	
12								

Displaying the formulas instead:

GooglePrice

File Edit View Insert Format Data Tools Add-ons Help All changes saved in Drive

	A	B	C	D	E	F	G
1	=now()						
2	**Google Symbol**	**Epic**	**Yahoo Ticker**	**Price**	**Currency**	**Change**	**LastTrade**
3	INDEXFTSE:UKX	UKX	^FTSE	=googlefinance(A3,"price")	=googlefinance(A3,"currency")	=googlefinance(A3,"change")	=googlefinance(A3,"tradetime")
4	INDEXFTSE:ASX	ASX	^FTAS	=googlefinance(A4,"price")	=googlefinance(A4,"currency")	=googlefinance(A4,"change")	=googlefinance(A4,"tradetime")
5	LON:LLOY	LLOY	LLOY.L	=googlefinance(A5,"price")	=googlefinance(A5,"currency")	=googlefinance(A5,"change")	=googlefinance(A5,"tradetime")
6	LON:VOD	VOD	VOD.L	=googlefinance(A6,"price")	=googlefinance(A6,"currency")	=googlefinance(A6,"change")	=googlefinance(A6,"tradetime")
7	LON:VWRL	VWRL	VWRL.L	=googlefinance(A7,"price")	=googlefinance(A7,"currency")	=googlefinance(A7,"change")	=googlefinance(A7,"tradetime")
8	LON:MRCH	MRCH	MRCH.L	=googlefinance(A8,"price")	=googlefinance(A8,"currency")	=googlefinance(A8,"change")	=googlefinance(A8,"tradetime")
9	LON:NG	NG.	NG.L	=googlefinance(A9,"price")	=googlefinance(A9,"currency")	=googlefinance(A9,"change")	=googlefinance(A9,"tradetime")
10	LON:BT.A	BT.A	BT-A.L	=googlefinance(A10,"price")	=googlefinance(A10,"currency")	=googlefinance(A10,"change")	=googlefinance(A10,"tradetime")
11	NASDAQ:AAPL		AAPL	=googlefinance(A11,"price")	=googlefinance(A11,"currency")	=googlefinance(A11,"change")	=googlefinance(A11,"tradetime")
12							
13							

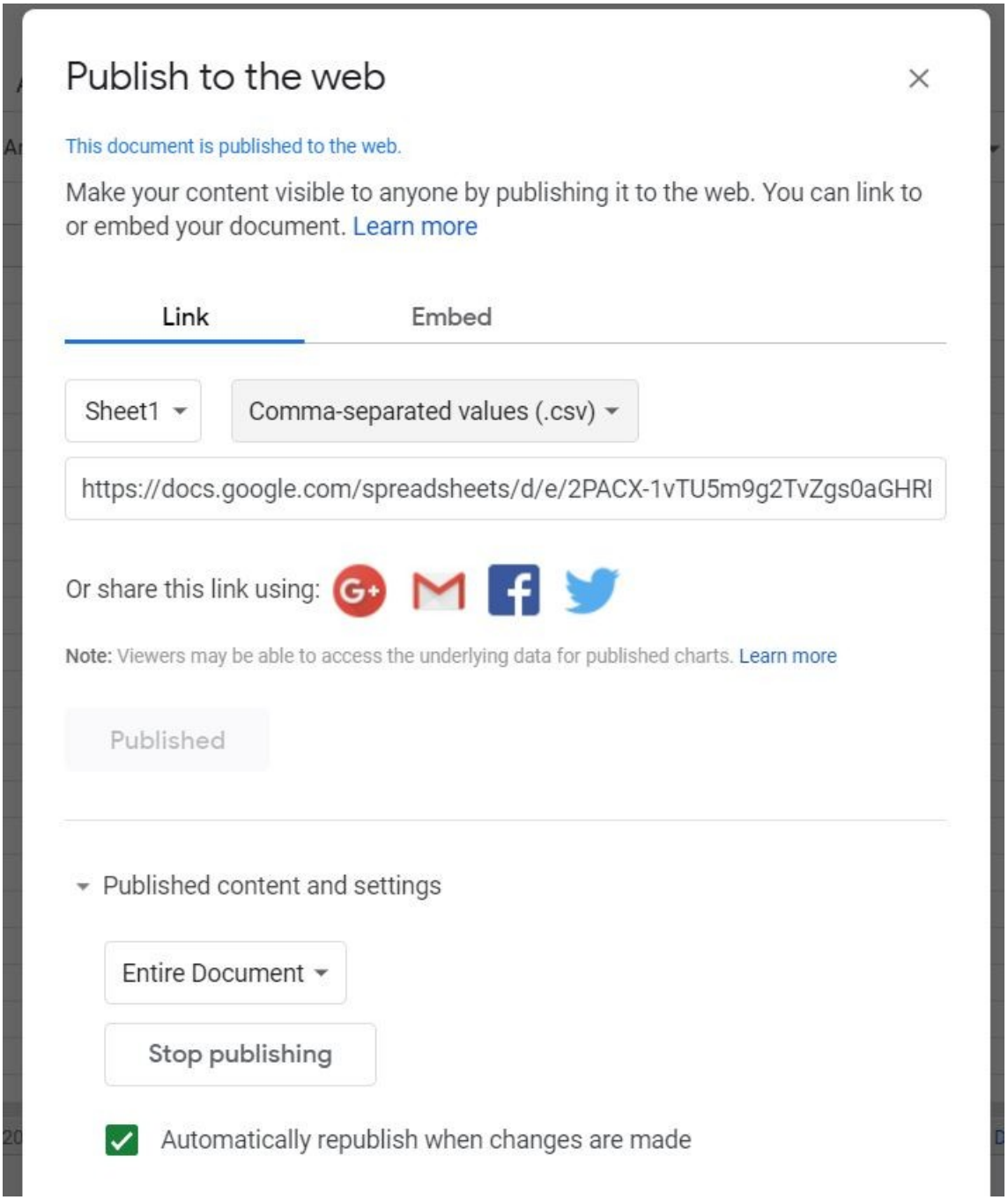
A full list of available data from Google Finance is shown in Appendix 1

Configuring and Publishing

Now that the Google Docs spreadsheet has been set up, it needs to be configured and published.

A) In the Google Docs menu, select FILE / SPREADSHEET SETTINGS / CALCULATION and set Recalculation to “On Change and Every Minute”, then click on “Save Settings”.

B) In the Google Docs menu, select FILE / PUBLISH TO THE WEB / LINK and change “Entire Document” to Sheet 1 (or whichever sheet you are using), and change “Web Page” to “Comma-separated values”. Enable “Automatically republish when changes are made”.
Copy the link to the clipboard (and paste it somewhere if you are not going to use it immediately)



That concludes the creation and configuration of the Google Docs spreadsheet. It can now be closed

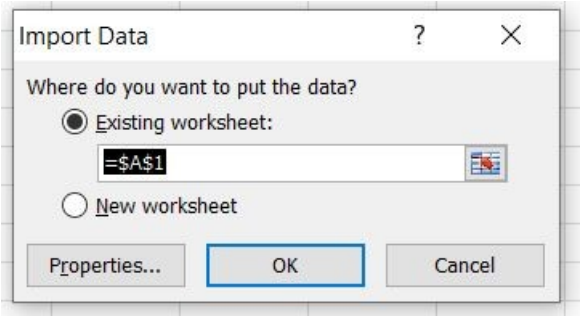
Importing into Excel

Note that this description applies to Excel 2010. Other versions of Excel may be slightly different.

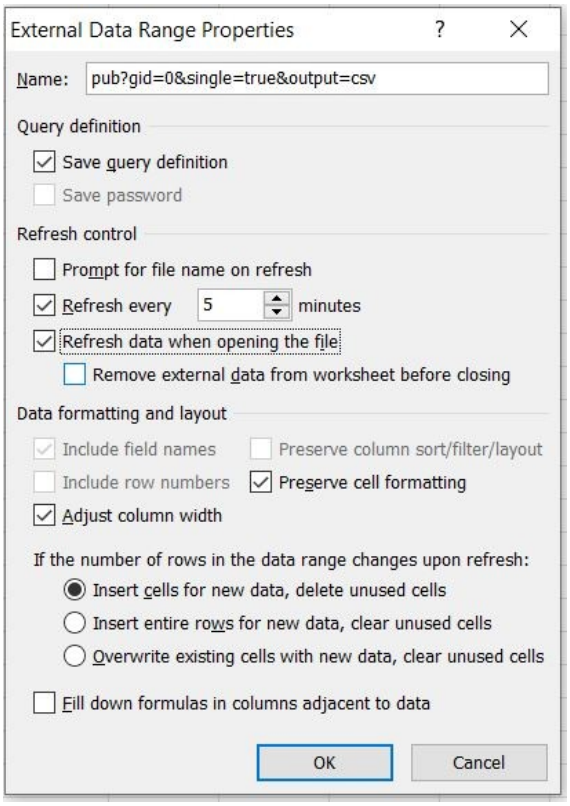
1. Open a new Excel document

2. From the menu bar, select DATA / FROM TEXT
   This opens a dialog box which accesses the computer's file system. In the File Name entry box, paste the link from step B above, and click on "Open"
   Here's a test link you can use: https://docs.google.com/spreadsheets/d/e/2PACX-1vQL6-5tkJO71BvRFiQ94rCPr7V2mbdZPuRISF015DeZEy4ekLK_M9WRhL-AV4Zy6VtTNGZhSop0YtBP/pub?gid=0&single=true&output=csv

3. In the subsequent Text Import wizard, select "Delimited" and click on "Next".
   Select Comma as the delimiter and click on "Next", then click on "Finish". You should then see a window like this:



4. Click on "Properties", then deselect "prompt for file name on refresh", select "Refresh every 5 minutes" and select "Refresh data when opening the file".
   Click on "OK"



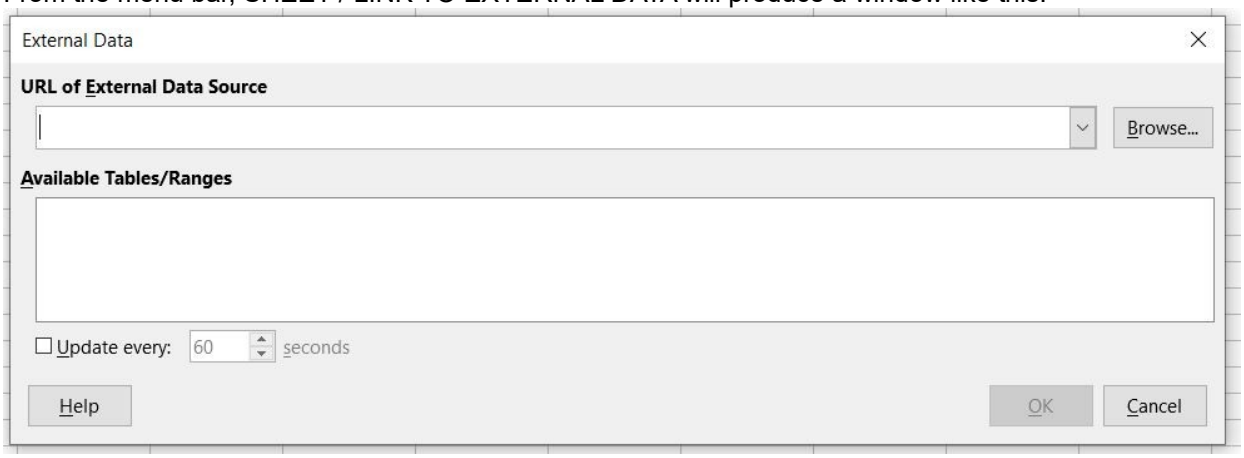
Click on "OK" again, and you should see the data in your Excel sheet. Save the file

Importing into LibreOffice

LibreOffice version 6.2.2.2 on Windows 10 is used for this description.

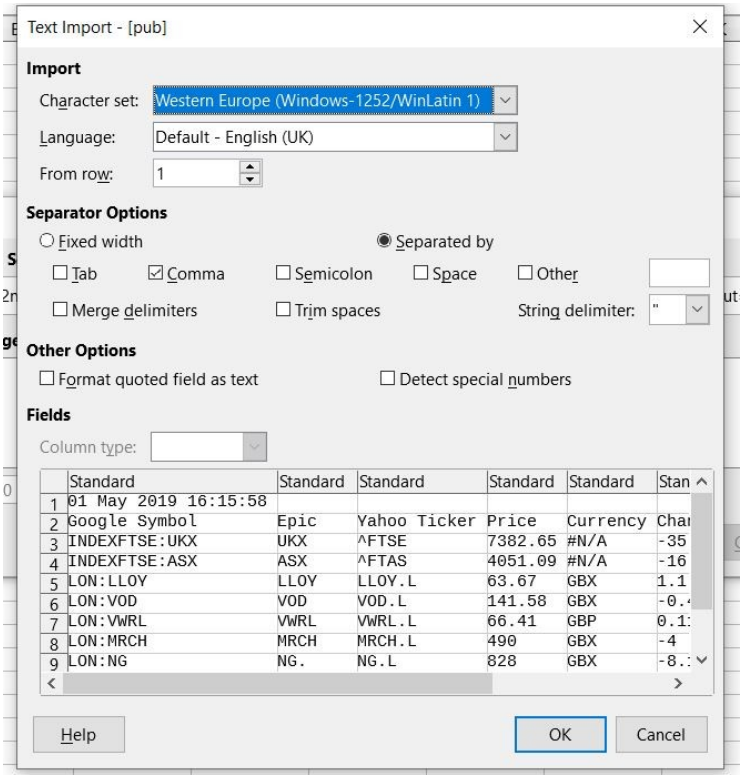
1. Open a new Calc spreadsheet

2. From the menu bar, SHEET / LINK TO EXTERNAL DATA will produce a window like this:



3. Paste the link from Google Docs into the “URL of External Data Source” and hit ENTER.
   Here’s a test link you can use: https://docs.google.com/spreadsheets/d/e/2PACX-1vQL6-5tkJO71BvRFiQ94rCPr7V2mbdZPuRISF015DeZEy4ekLK_M9WRhL-AV4Zy6VtTNGZhSop0YtBP/pub?gid=0&single=true&output=csv

   This will produce a window like this:



   Select Comma as the separator option and click OK,

4. In the window in step 2 above, select “Update every 300 seconds” and click on “OK”. You should then see the data in your Calc document. Save the file.

Comments

1. Both Excel and LibreOffice allow the user to specify the refresh period to call new data from the Google Docs spreadsheet. It's tempting to set this to a short period such as 1 minute, but it's not quite that simple.
   Empirically, it does seem that Google limits the frequency of refresh, so calling for refreshed data at short intervals may not achieve anything.
   I've also found that if the refresh is set to, say, 2 minutes, then typically data is updated every 4 minutes (though sometimes 6 minutes and sometimes 2 minutes)
   I think a refresh of 5 minutes is a reasonable compromise

2. I found that LibreOffice versions before 6.1, and all OpenOffice versions, do not recognise .csv data when pasting in the link from step B above. I believe this was a bug which is fixed in version 6.1 onwards

Appendix 1
Data available from Google Finance

These are taken from https://support.google.com/docs/answer/3093281?hl=en

"price" - Realtime price quote, delayed by up to 20 minutes.

"priceopen" - The price as of market open.

"high" - The current day's high price.

"low" - The current day's low price.

"volume" - The current day's trading volume.

"marketcap" - The market capitalization of the stock.

"tradetime" - The time of the last trade.

"datadelay" - How far delayed the realtime data is.

"volumeavg" - The average daily trading volume.

"pe" - The price/earnings ratio.

"eps" - The earnings per share.

"high52" - The 52-week high price.

"low52" - The 52-week low price.

"change" - The price change since the previous trading day's close.

"beta" - The beta value.

"changepct" - The percentage change in price since the previous trading day's close.

"closeyest" - The previous day's closing price.

"shares" - The number of outstanding shares.

"currency" - The currency in which the security is priced. Currencies don't have trading windows, so open, low, high, and volume won't return for this argument.