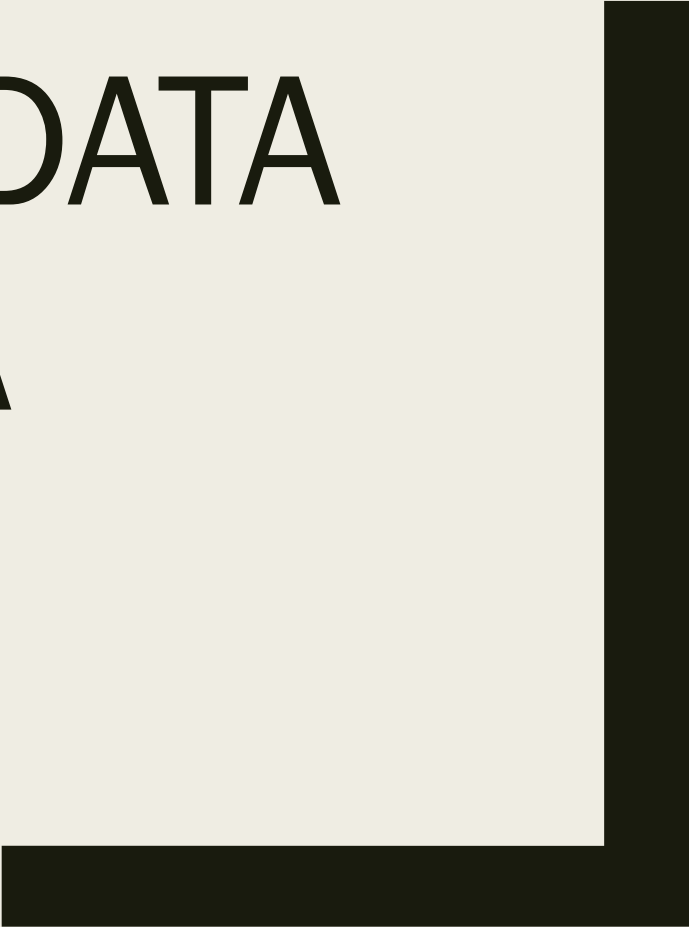




STRUCTURED DATA & SCHEMA

What is it and why does it matter



We'll be looking at:

- What structured data is
- Examples of structured data
- What schema markup is
- Examples of schema markup
- Why they are important
- How we can use them
- Tools to help you with structured data and schema
- Resources

Structured Data

- This is the **on-page code** that helps search engines understand what's on a web page.
- It **provides explicit clues to the crawler** about the meaning of the data on the page and helps it classify the content on the page.
- It is the standard format for providing **information about the page**.
- Google's preferred format for structuring data is called **JSON-LD** which stands for JavaScript Object Notation for Linked Data.

Example of Structured Data

- When you are looking for a business on Google, all the extra information you find, known as **rich snippets**, is created by using structured data on your page.



Tashas

Website

Directions

Save

4.2 ★★★★★ 752 Google reviews

Cafe

Airy, contemporary café and coffee shop delivering breakfasts, global dishes and frozen yogurt.

Address: Shop No. G28, The Zone, Oxford Rd, Rosebank, Johannesburg, 2196

Hours: Open · Closes 9PM ▾

Phone: 011 447 7972

[Suggest an edit](#)

Know this place? [Answer quick questions](#)

Questions & answers

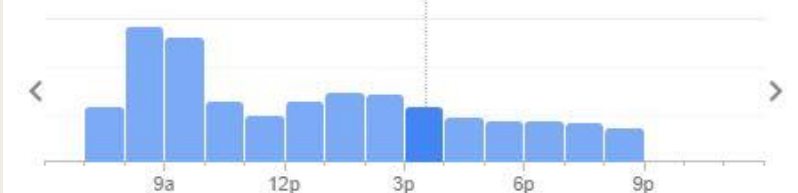
[See all questions \(2\)](#)

[Ask a question](#)

Popular times

[Fridays](#) ⇅

3 PM: Usually not too busy



Example of Structured Data

- When looking up a review, all the information included with the meta-title and meta-description is generated by including structured data in the page's HTML text.

BlacKkKlansman (2018) - IMDb

<https://www.imdb.com/title/tt7349662/> ▼

★★★★★ Rating: 7.7/10 - 47,744 votes

Ron Stallworth, an African American police officer from Colorado Springs, CO, successfully manages to infiltrate the local Ku Klux Klan branch with the help of a ...


Schema Markup

- This is the **code or vocabulary** you put on the web page to **indicate structured data**.
- It **tells** the search engine result pages (SERPs) to **display all the extra information** that makes up a rich snippet.
- The first schema markup tool was developed by **schema.org**, which is free to use.

Example of Schema Markup

- Let's say you've uploaded a video onto your webpage about the film *Blakkklansman*.
- Google's search engine will just read and index it as Blackkkklansman.
- Using the **video schema markup** from schema.org with the video, it is picked up as a video and shows up in the rich snippets in the search engine results.

Videos



BLACKkKLANSMAN - Official Trailer [HD] - In Theaters August 10
Focus Features
YouTube - May 14, 2018

BLACKkKLANSMAN Official Trailer #1 (2018) Adam Driver, Spike Lee
JoBlo Movie Trailers
YouTube - May 14, 2018

BLACKKKLANSMAN Extended Trailer Featuring PRINCE'S "MARY ..."
Focus Features
YouTube - Aug 23, 2018

Example of Schema Markup

- This is what the JSON-LD code looks like on schema.org.
- This looks like a long list of intimidating code but don't worry, most of the schema markup doesn't require alterations.

```
Example 1
Without Markup  Microdata  RDFa  JSON-LD
<script type="application/ld+json">
{
  "@context": "http://schema.org",
  "@type": "MusicGroup",
  "event": [
    {
      "@type": "Event",
      "location": "Memphis, TN, US",
      "offers": "ticketmaster.com/foofighters/may20-2011",
      "startDate": "2011-05-20",
      "url": "foo-fighters-may20-fedexforum"
    }, {
      "@type": "Event",
      "location": "Council Bluffs, IA, US",
      "offers": "ticketmaster.com/foofighters/may23-2011",
      "startDate": "2011-05-23",
      "url": "foo-fighters-may23-midamericacenter"
    }
  ],
  "image": [
    "foofighters-1.jpg",
    "foofighters-2.jpg",
    "foofighters-3.jpg"
  ],
  "interactionStatistic": {
    "@type": "InteractionCounter",
    "interactionType": "http://schema.org/CommentAction",
    "userInteractionCount": "18"
  },
  "name": "Foo Fighters",
  "track": [
    {
      "@type": "MusicRecording",
      "audio": "foo-fighters-rope-play.html",
      "duration": "PT4M53",
      "inAlbum": "foo-fighters-wasting-light.html",
      "interactionStatistic": {
        "@type": "InteractionCounter",
        "interactionType": "http://schema.org/ListenAction",
        "userInteractionCount": "14300"
      },
      "name": "Rope",
      "offers": "foo-fighters-rope-buy.html",
      "url": "foo-fighters-rope.html"
    }, {
      "@type": "MusicRecording",
      "audio": "foo-fighters-everlong-play.html",
      "duration": "PT6M33",
      "inAlbum": "foo-fighters-color-and-shape.html",
      "name": "Everlong",
      "interactionStatistic": {
        "@type": "InteractionCounter",
        "interactionType": "http://schema.org/ListenAction",
        "userInteractionCount": "11700"
      },
      "offers": "foo-fighters-everlong-buy.html",
      "url": "foo-fighters-everlong.html"
    }
  ],
  "video": {
    "@type": "VideoObject",
    "description": "Catch this exclusive interview with Dave Grohl and the Foo Fight",
    "duration": "TIM33S",
    "name": "Interview with the Foo Fighters",
    "thumbnail": "foo-fighters-interview-thumb.jpg"
  }
}
</script>
```


Why are they so important?

- Structured data **helps Google understand your website and its contents better**. This means that it's indexed more **accurately**.
- As Google and other search engines become more sophisticated in how they find information and display search results, focussing only on keywords is becoming **outdated**.
- **Localisation and personalisation** of search results, and a migration to **mobile** is increasing the importance of structured data as it has a greater impact on search engine results.

Why are they so important?

- Schema markups **help websites rank better for content** because it also includes information about the **type of content** on a page.
- A study was done that found that websites with schema markups ranked better in SERPs than those without – they ranked an **average of four positions higher**.
- Schema markups are severely under utilised. Searchmetrics found that **only 0.3%*** of websites used schema.

*<https://www.searchmetrics.com/news-and-events/schema-org-in-google-search-results/>

How to Use Them

- We can incorporate structured data into nearly everything we do here.
- But there are three areas where they could be utilised: **reviews**, **news stories** and **blogs**, and **how-to-plays**.
- You copy the schema markup either from **schema.org** or the less intimidating **Steal Our JSON-LD**.

JSON-LD EXAMPLES

Article

Blog Post

Book

Breadcrumb

Email Message

Event

Venue

Concert

Concert: Multiple Performers

Job Posting

Local Business

News Article

Organization

Person

Product

Recipe

Social Network Profiles

Web Page

Video

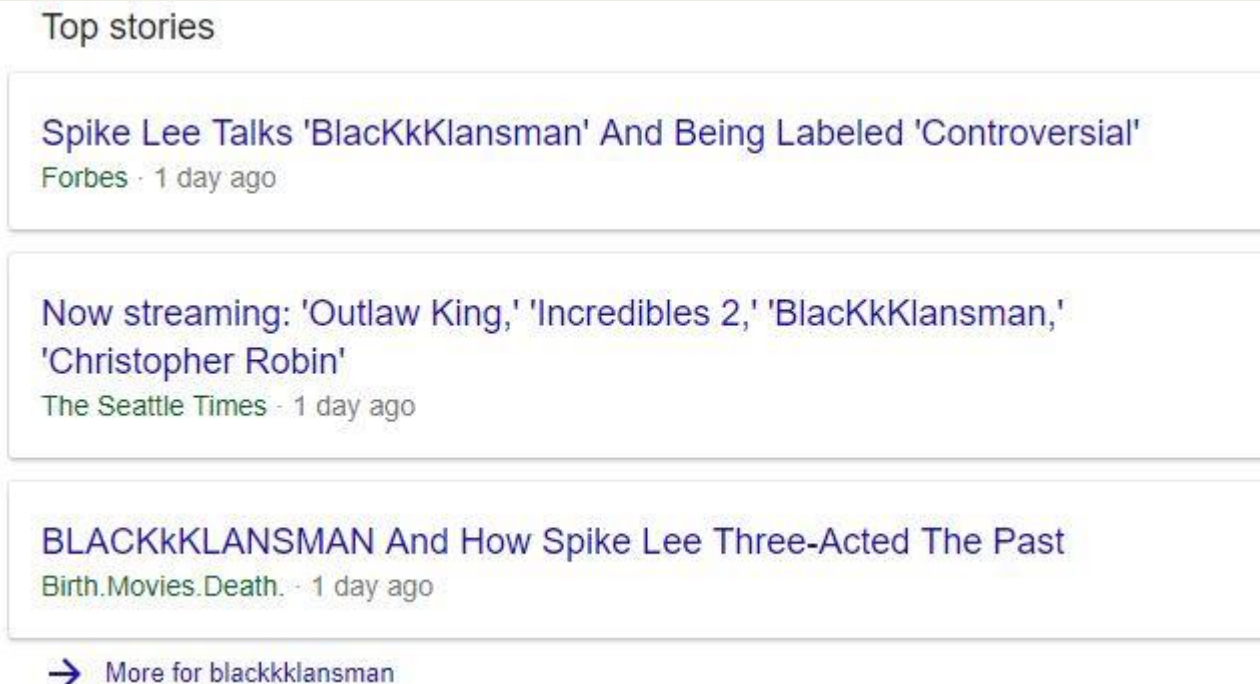
About Us

Review

JSON-LD Generator

How We Can Use Them cont.

- We can use the review schema markup to get out slot reviews and casino reviews better SERPs.
- The Howto schema markup can be used to generate rich snippets of our “How to Play” pages.
- We could also utilise them with our blog posts which feature news stories. They’ll show up like this on Google search:
- We are only limited by our imagination!



Top stories

[Spike Lee Talks 'BlacKkKlansman' And Being Labeled 'Controversial'](#)
Forbes · 1 day ago

[Now streaming: 'Outlaw King,' 'Incredibles 2,' 'BlacKkKlansman,' 'Christopher Robin'](#)
The Seattle Times · 1 day ago

[BLACKkKLANSMAN And How Spike Lee Three-Acted The Past](#)
Birth.Movies.Death. · 1 day ago

→ [More for blackkklanman](#)

For a Review...

- Let's say I'm writing a review on the latest Dr Marten boot for spring.
- I would write the standard full length review for my fashion blog called...Fashion Grrrl. Now I want it to have structured data that will show up as a review.



For a Review...

- Once I'm done with the review contents, I'll go on Steal Our JSON-LD and copy the schema markup for a review.

Review

As of January 2016, Google has added support for JSON-LD and reviews. This is a big day for JSON-LD in the fact that reviews are a really popular type in the webmaster community. The following code has been validated and has been proven to work with Google.

```
1 <script type="application/ld+json">
2 {
3   "@context": "http://schema.org/",
4   "@type": "Product",
5   "image": "http://www.example.com/iphone-case.jpg",
6   "name": "The Catcher in the Rye",
7   "review": {
8     "@type": "Review",
9     "reviewRating": {
10      "@type": "Rating",
11      "ratingValue": "4"
12    },
13    "name": "iPhone 6 Case Plus",
14    "author": {
15      "@type": "Person",
16      "name": "Linus Torvalds"
17    },
18    "datePublished": "2016-04-04",
19    "reviewBody": "I loved this case, it is sturdy and lightweight. Only issue is that it smudg
20    "publisher": {
21      "@type": "Organization",
22      "name": "iPhone 6 Cases Inc."
23    }
24  }
25}
26</script>
```

For a Review...

- I'll then paste it in the text view of the page and add in the required information.
- In this case:
 - the **images HTML code** (URL location)
 - a **general name** for the product
 - a **rating** out of 5
 - a second more **descriptive name**
 - **name** of the person writing the review
 - the **date** the review is published
 - a **brief description** of why you gave the product the rating you did
 - the name of your **organisation**

So for my review on the 1460 boot...

- The image HTML code is <https://www.casinoza.com/wp-content/uploads/2018/09/dr-martens-black-boot-300x251.png>
- The general name for the product is “Spring range Dr Marten 1460”
- The rating is 5
- The second more descriptive name is “Dr Marten black 1460 with flower cut-outs “
- The person writing the review is Brooke Steton
- The published date is 2018-11-09
- The brief description is “The latest 1460 to come on the Dr Martens show room features leather light pink flower cut outs and silver studs, which lend the iconic a feminine edge. Pair them with a sheer light summer dress or denim wide leg trousers. These 1460s will set you apart from the crowd this spring.”
- And the organisation is Fashion Grrrl

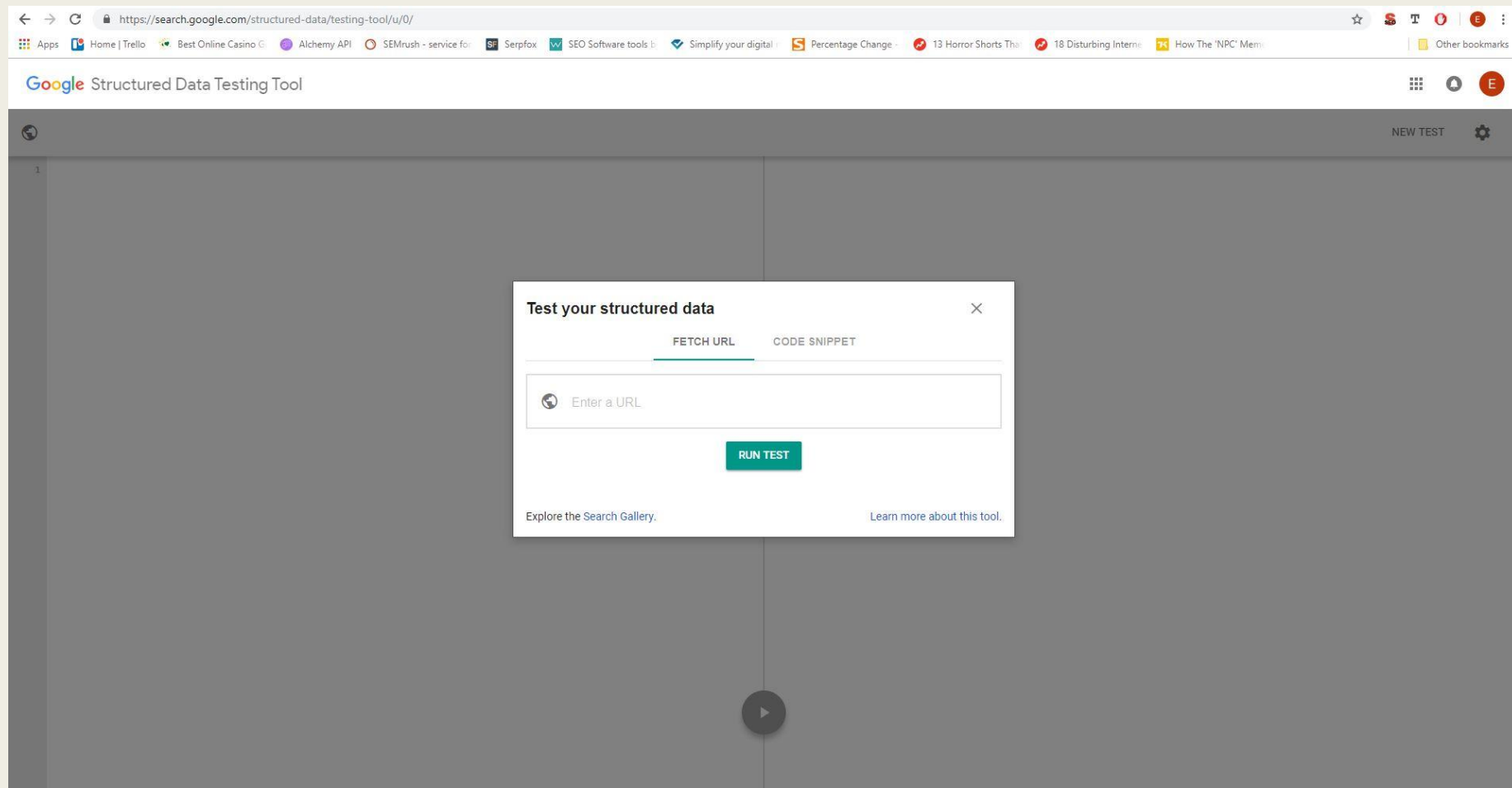
The schema markup HTML code looks like this:

```
<script type="application/ld+json">
{
  "@context": "http://schema.org/",
  "@type": "Product",
  "image": "https://www.casinoza.com/wp-content/uploads/2018/09/dr-martens-black-boot-300x251.png",
  "name": "Spring range Dr Marten 1460",
  "review": {
    "@type": "Review",
    "reviewRating": {
      "@type": "Rating",
      "ratingValue": "5"
    },
    "name": "Dr Marten black 1460 with flower cut-outs ",
    "author": {
      "@type": "Person",
      "name": "Nolwandle Zondi"
    },
    "datePublished": "2018-11-09",
    "reviewBody": "The latest 1460 to come on the Dr Marten show room features leather light pink flower cut outs and silver studs, which lend the iconic boot an edge. Pair them with a sheer light summer dress or denim wide leg trousers. These 1460s will set you apart from the crowd this spring.",
    "publisher": {
      "@type": "Organization",
      "name": "Fashion Grrrl"
    }
  }
}
</script>
```

Tools to Help You with Structured Data and Schema Markup: Testing Tool

- To test your schema markup during development, Google has its own testing tool called the Structured Data Testing tool.
- Use this tool during development i.e. when you're writing the code.
- <https://search.google.com/structured-data/testing-tool>

Tools to Help You with Structured Data and Schema Markup: Testing tool



Tools to Help You with Structured Data and Schema Markup: Testing tool

The screenshot shows a web browser displaying the Zappos.com product review page for Dr. Martens 1460 shoes. The browser's address bar shows the URL: <https://www.zappos.com/product/review/104730/page/1/start/5>. The Zappos logo is visible on the left, and a search bar with the text "Search for shoes, clothes, etc." and a "SEARCH" button is in the center. A "MY CART" button is on the right. Below the navigation bar, there are links for "Women", "Men", "Kids", "Departments", "Brands", and "Sale", along with a "Sign In / Register" link. The main content area features the product title "Dr. Martens 1460 Reviews". On the left, it displays "600 reviews total" and buttons for "Write A Review" and "View Product". In the center, there is a table of overall ratings and customer fit survey results. On the right, there is a sidebar with sections for "ZAPPOS FAMILY CULTURE", "Zappos Family Core Values", "Customer Testimonials", "Enjoy Fun and A Little Weirdness", "The Zappos.com Experience", "Unique Customers", and "Customers In Training".

Overall Rating	Percentage	Customer Fit Survey
5 stars	69%	72% "Felt true to size"
4 stars	15%	87% "Felt true to width"
3 stars	6%	64% "Moderate arch support"
2 stars	3%	
1 star	7%	

600 reviews total

540 are "Favorable"

60 are "Critical"

[Write A Review](#)

[View Product](#)

[ZAPPOS FAMILY CULTURE](#)

Learn what inspires Zappos.com to provide the best service!

Zappos Family Core Values:
[10 Values We Live By >](#)

Customer Testimonials:
[Customers Connect >](#)

Enjoy Fun and A Little Weirdness:
[Check out Blogs >](#)

The Zappos.com Experience:
[Share Your Videos >](#)

Unique Customers:
[Furry Customers >](#)

[Customers In Training >](#)

Tools to Help You with Structured Data and Schema Markup: Testing tool

The screenshot shows the Google Structured Data Testing Tool interface. At the top, the Google logo is followed by the text "Structured Data Testing Tool". On the right side of the header, there are icons for a grid, a bell, and a profile picture. Below the header, the URL "https://www.zappos.com/product/review/104730/page/1/start/5" is displayed in the address bar, along with "NEW TEST" and a settings gear icon. The main content area is split into two panels. The left panel contains HTML code with line numbers 1 through 14. The right panel, titled "Product", shows a structured data preview with a dropdown menu set to "All (1)". The preview table has two sections: "Product" with 0 errors and 0 warnings, and "AggregateRating" with 0 errors and 0 warnings. A play button icon is overlaid on the right panel.

```
1 <!doctype html>
2 <!-- zfc urlrewrite off -->
3 <html lang="en-US">
4 <head><!-- ZFC --><script type="text/javascript">
5 (function(a){var b=
6 {},c=encodeURIComponent,d=a.zfcUUID,e;a.onerror=function(a,f,g)
7 {return e="/err.cgi",a&&(e+="?msg="+c(a),f&&(e+="&url="+c(f),g&&
8 (e+="&line="+c(g))),d&&(e+="&uuid="+c(d)),b[e]||(b[e]=1,(new
9 Image).src=e)),!0}})(window)</script><script
10 type="text/javascript">
11 var zfcCookieDomain='.zappos.com', bmv={}, a9ab=1, pdi=3, jno=0,
12 raz=1;
13 if (/couture/.test(window.location.hostname)) {
14   raz=0;
15 }
16 if (/^secure-(?:www|vip)\./.test(window.location.hostname)) {
17   jno=1;
18 }
19 }</script><script type="text/javascript">
20   var zfcUUID = function(){var a=function()
```

Product		0 ERRORS	0 WARNINGS	^
@type	Product			
name	1460			
aggregateRating				
@type	AggregateRating			
ratingValue	4			
reviewCount	600			
ratingCount	600			
review				

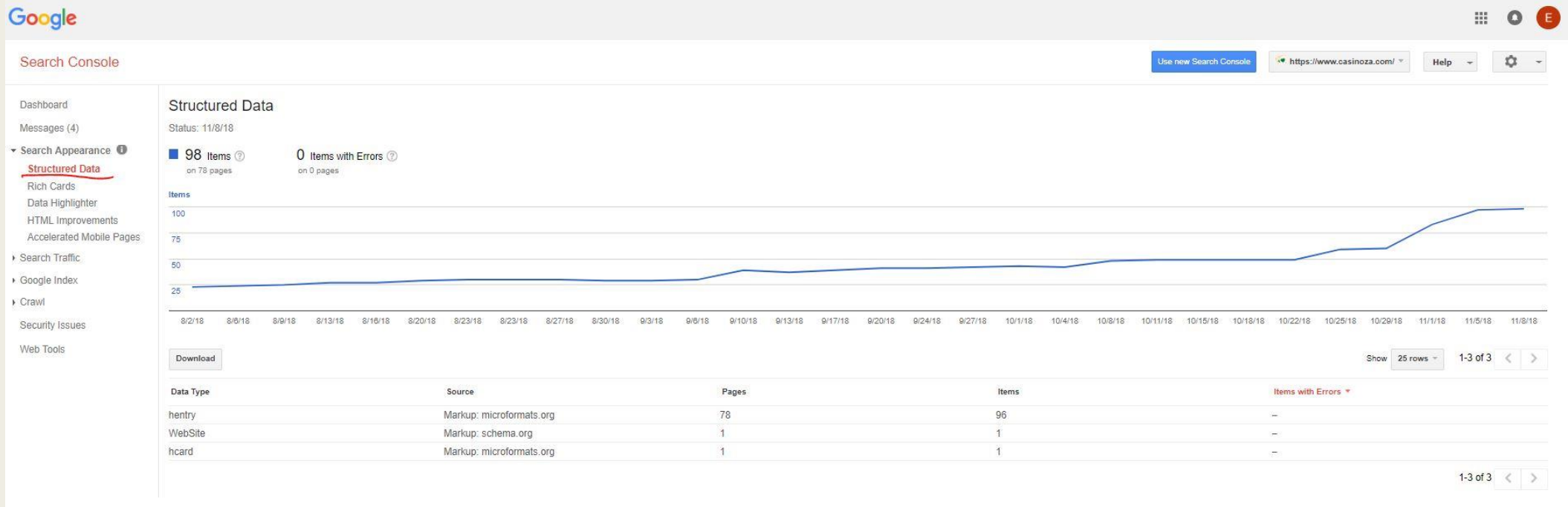
Tools to Help You with Structured Data and Schema Markup: Rich Result Status Report

- To monitor the health of your pages with structured data, use the rich result status report.
- It's a built in app on Google search console. Click on Search Appearance in the Dashboard.

The screenshot displays the Google Search Console interface for the website <https://www.casinoza.com/>. The left sidebar shows the navigation menu with 'Search Appearance' highlighted. The main content area features a yellow banner at the top with the text 'Use the new Overview report' and a 'Go to the new report' button. Below this, a 'New and important' section reports a 'New AMP issue detected for site https://www.casinoza.com/' dated Oct 24, 2018, with a 'View all' link. The 'Current Status' section is divided into three panels: 'Crawl Errors' (Site Errors: DNS, Server connectivity, Robots.txt fetch, all with green checkmarks; URL Errors: 1 Not found), 'Search Analytics' (Total Clicks: 190, with a line chart showing daily fluctuations), and 'Sitemaps' (0 URLs submitted).

Tools to Help You with Structured Data and Schema Markup: Rich Result Status Report

- To monitor the health of your pages with structured data, use the rich result status report.
- It's a built in app on Google search console. Click on Search Appearance in the Dashboard. Then click on Structured Data to view if it has any errors.



The screenshot displays the Google Search Console interface for the domain <https://www.casinoza.com/>. The main section is titled "Structured Data" and shows a status of "11/8/18". It reports "98 Items" on 78 pages and "0 Items with Errors" on 0 pages. A line graph shows the number of items over time, starting at approximately 25 in August 2018 and rising to 98 by late October 2018. Below the graph is a table with the following data:

Data Type	Source	Pages	Items	Items with Errors
hentry	Markup: microformats.org	78	96	—
WebSite	Markup: schema.org	1	1	—
hcard	Markup: microformats.org	1	1	—

Resources

- <https://yoast.com/howto-structured-data/>
- <https://yoast.com/what-is-structured-data/>
- <https://www.adherecreative.com/blog/bid/153475/what-is-structured-data-and-why-does-it-matter-for-seo>
- <https://developers.google.com/search/docs/guides/intro-structured-data>
- <https://neilpatel.com/blog/get-started-using-schema/>
- <https://www.youtube.com/watch?v=xQeRA-Ojq5c>
- Schema.org: <https://www.schema.org>
- Steal Our JSON-LD: <https://www.jsonld.com>
- Google's Structured Data Guidelines: <https://developers.google.com/search/docs/guides/sd-policies>
- Structured Data Testing Tool: <https://search.google.com/structured-data/testing-tool#>