

Full Stack Web Development

WS2019 - BSA5 Ausgewählte Kapitel

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Smart Homes and Assistive Systems

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Vue - JavaScript Frameworks

- AngularJS
- Angular
- React
- Vue.js
- Ember.js
- ...



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Vue - Evan You [1, 3]

- Born and raised in Wuxi, PRC (无锡中国).
- Recruited by Google for his work, inspired by [Chrome experiments](#), and joined the [Five program](#) during his study in the [U.S.](#).
- Started the work on [Vue.js](#) as a personal project during his work at Google Creative Labs in 2013.
- Works full-time on Vue since 2016.

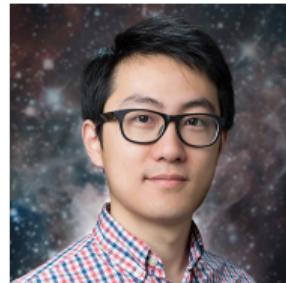


Figure 1: Evan You
(尤雨溪)



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Vue.js

- Client-side JavaScript framework
- Progressive framework
- Performant
- Lightweight (~33.30kB - `min+gzip`)
- Extensible
 - Vue Router
 - Vuex
 - Vue Server Renderer



Figure 2: Vue.js Logo
[2]



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Vue.js - Core Features

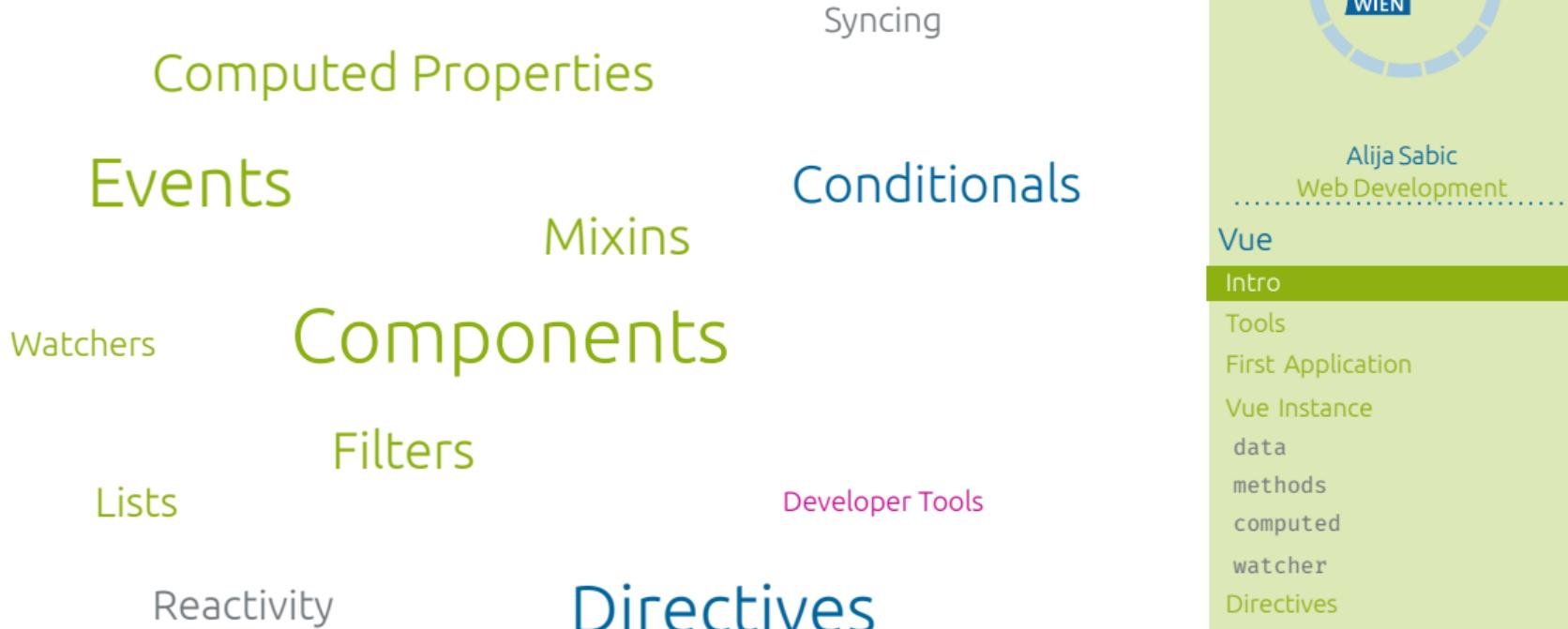


Figure 3: Vue.js Core Features



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Vue - Hello Vue



```
1  <!DOCTYPE html>
2  <html>
3    <head>
4      <meta charset="utf-8" />
5      <title>Vue Setup</title>
6      <script src="https://vuejs.org/js/vue.js"></script>
7    </head>
8    <body>
9      <div id="app">{{ text }}</div>
10   </body>
11   <script>
12     new Vue({
13       el: "#app",
14       data: {
15         text: "Hello Vue!"
16       }
17     });
18   </script>
19 </html>
```

Listing 1: Minimal Example

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Vue - Hello Vue

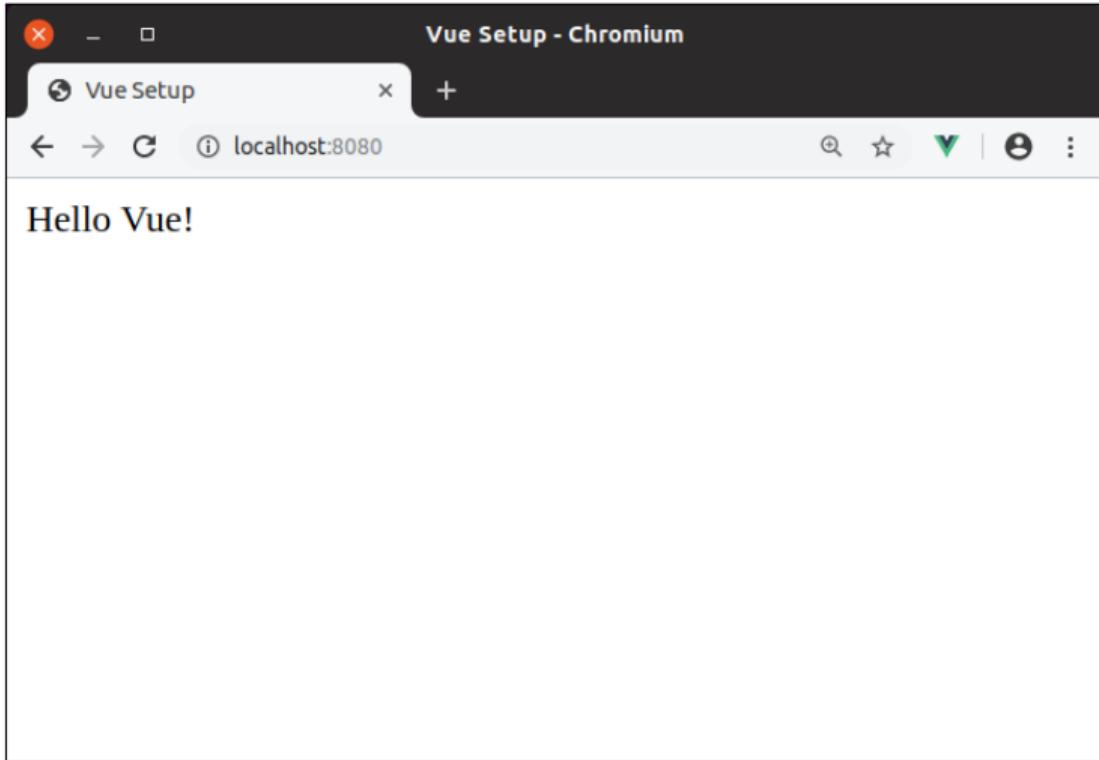


Figure 4: Minimal Example



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Vue - Hello Vue

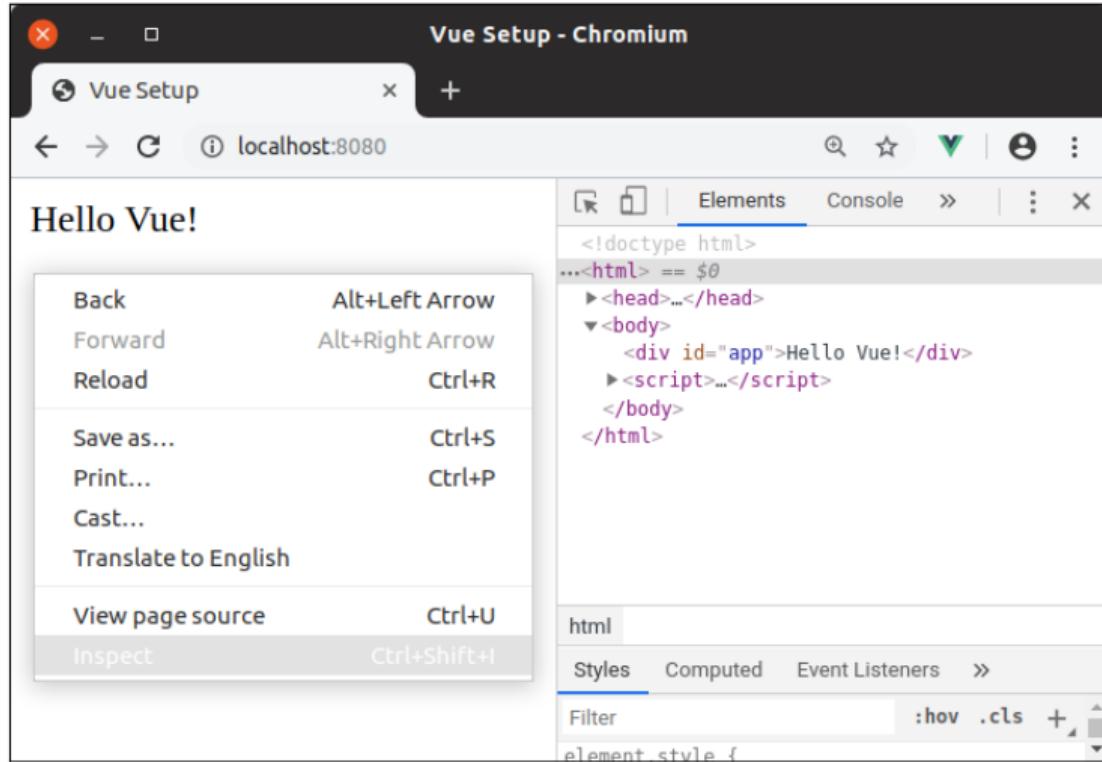


Figure 5: Chromium Developer Tools



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Vue - Browser Devtools

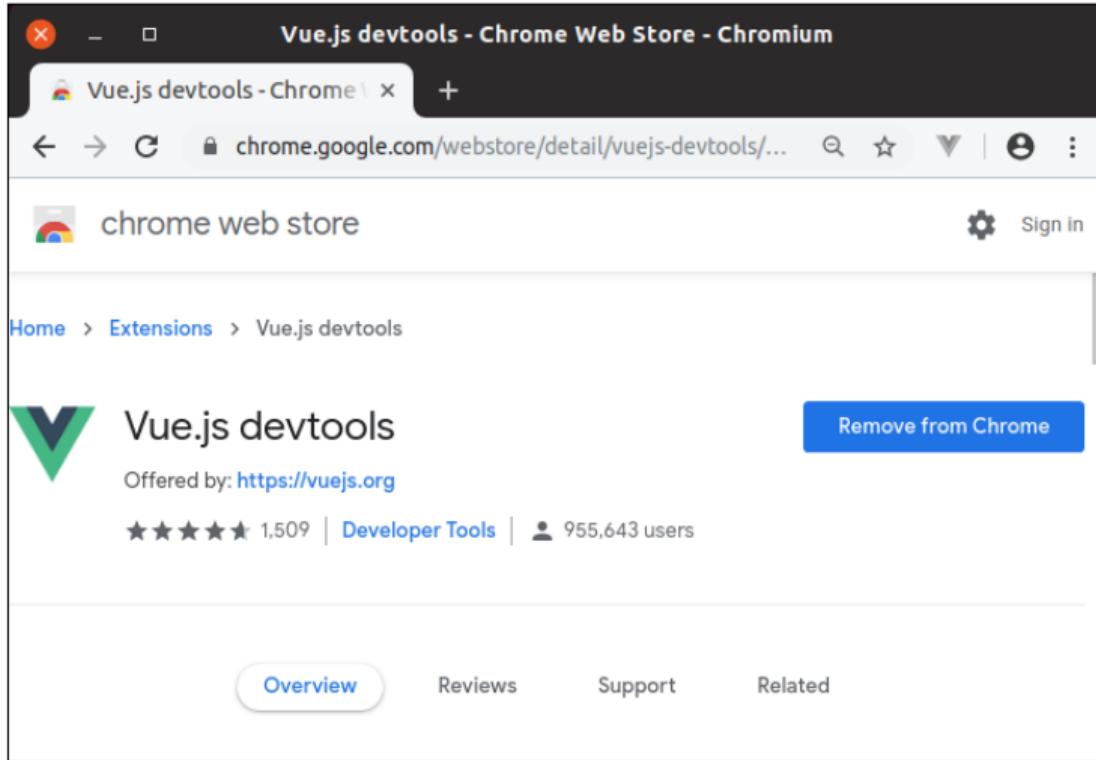


Figure 6: Chrome Vue.js Devtools



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Vue - Browser Devtools

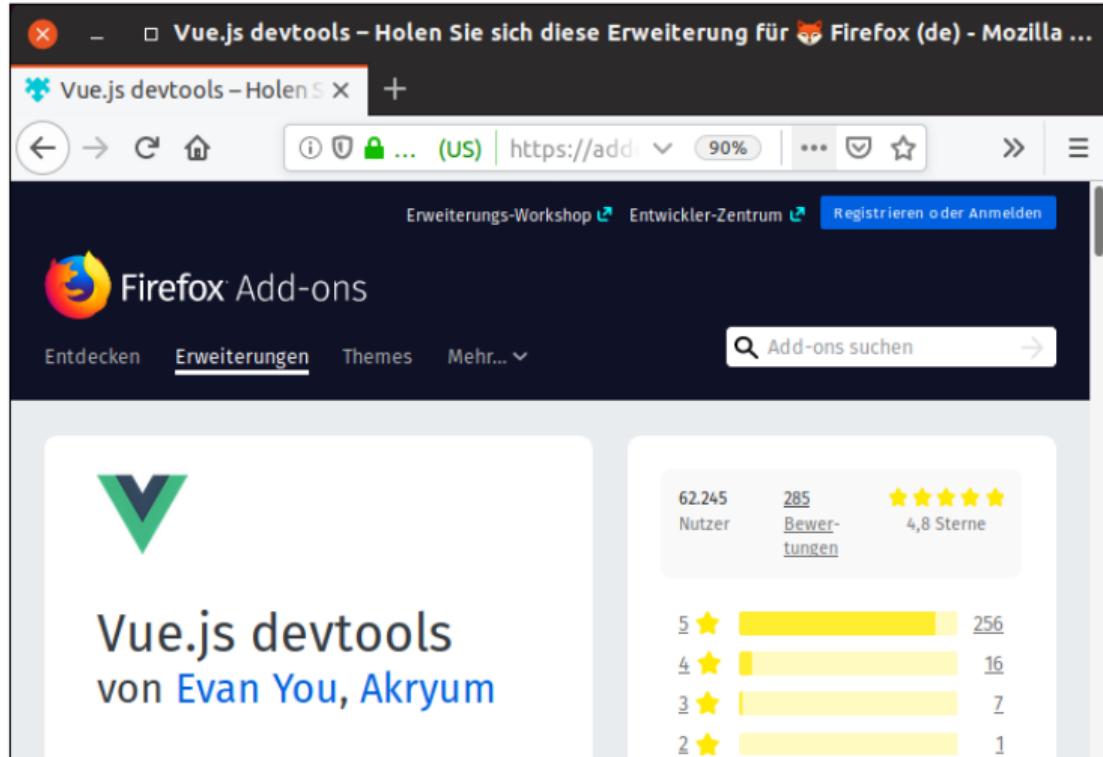


Figure 7: Firefox Vue.js Devtools



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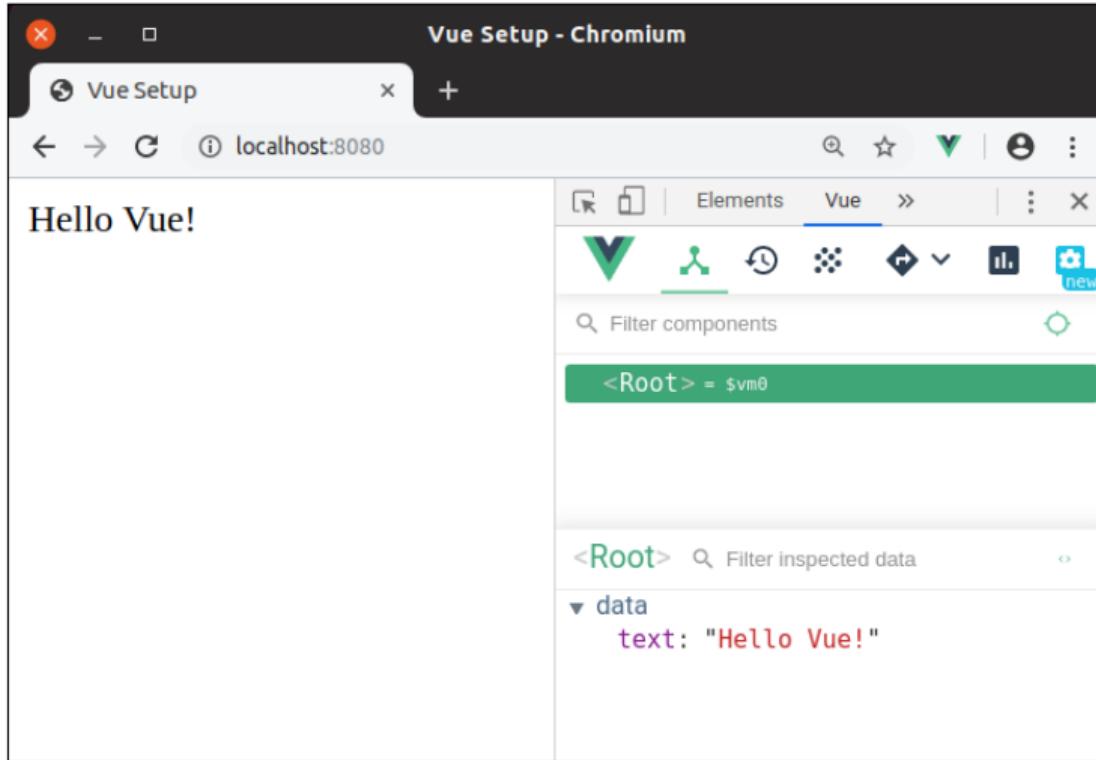


Figure 8: Chrome Vue.js Devtools - Tab



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Vue - HTTP Server

```
1 $~ node -v  
2 v10.16.3  
3 $~ npm -v  
4 6.9.0  
5 $~ npm install -g http-server  
6 + http-server@0.11.1  
7 added 26 packages from 28 contributors in 6.096s
```

Listing 2: Install **npm** module **http-server**



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Vue - HTTP Server

```
1 $~ ls
2 Desktop Downloads Pictures Public Videos
3 Documents Music project Templates
4 $~ http-server project/
5 Starting up http-server, serving project/
6 Available on:
7   http://127.0.0.1:8080
8 Hit CTRL-C to stop the server
9 $~/project http-server .
10 Starting up http-server, serving .
11 Available on:
12   http://127.0.0.1:8080
13 Hit CTRL-C to stop the server
```

Listing 3: Host directory with `http-server`



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Vue - First Application



```
1 <!DOCTYPE html>
2 <html>
3   <head>
4     <meta charset="utf-8" />
5     <title>Vue Setup</title>
6     <script src="https://vuejs.org/js/vue.js"></script>
7   </head>
8   <body>
9     <div id="app">
10       <input type="text" v-on:input="updateText" />
11       <p>{{ text }}</p>
12     </div>
13   </body>
```

Listing 4: First Vue application.

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Vue - First Application

```
14 <script>
15   new Vue({
16     el: "#app",
17     data: {
18       text: "Hello Vue!"
19     },
20     methods: {
21       updateText: function(event) {
22         this.text = event.target.value;
23       }
24     });
25   });
26 </script>
27 </html>
```

Listing 4: First Vue application.



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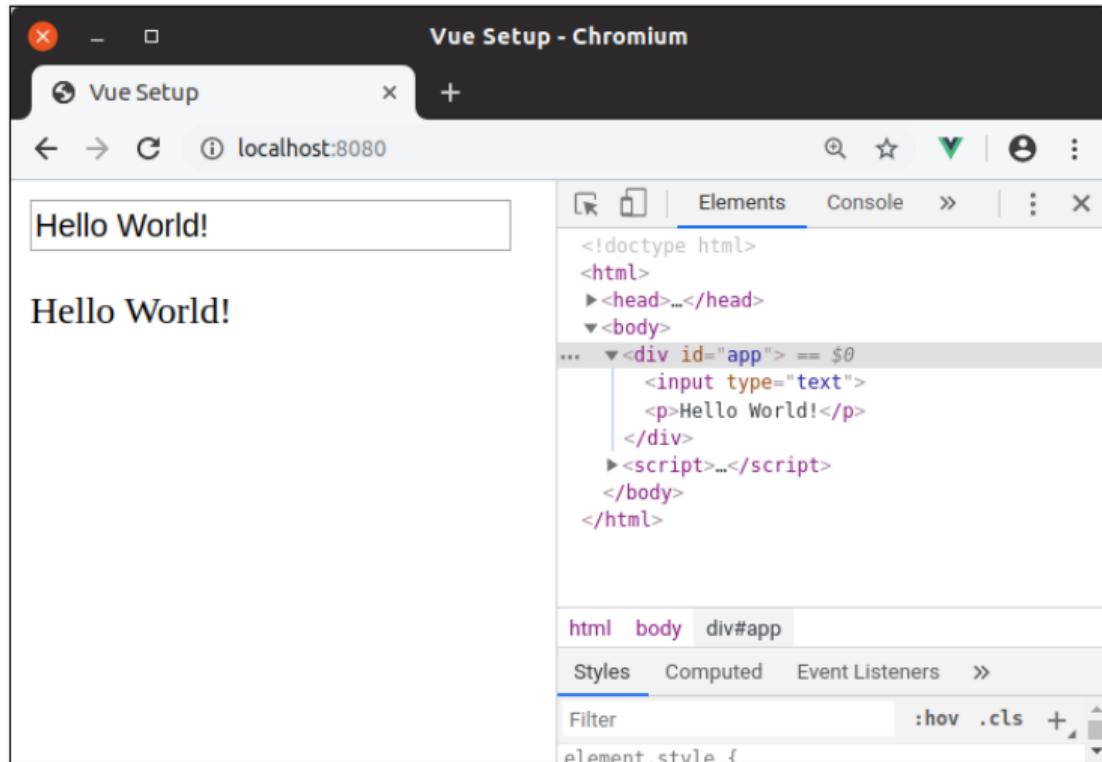


Figure 9: First Vue application.



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Acronyms I

HTTP Hypertext Transfer Protocol

npm Node Package Manager

PRC People's Republic of China

U.S. United States



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Acronyms

References

References I

- [1] V. Cromwell, "Between the Wires: An interview with Vue.js creator Evan You," <https://dev.to/betweenthewires/evan-you>, 11 2016.
- [2] Evan You, "The Progessive JavaScript Framework," <https://vuejs.org/>, 2014.
- [3] ——, "GitHub Customer Stories - Evan You," <https://github.com/customer-stories/yyx990803>, 2019.



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References