

Assignment 4 - Universal design

Group: Assignment 4 4

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1. Summary

SAS has not made their website user-friendly for alternate impaired accessabilities. Users cannot order a ticket without either creating an account or using a mouse. The entire web page is also difficult to navigate.

2. Introduction

This report describes the conformance of the sas.no/ website with part of W3C's Web Content Accessibility Guidelines. The review process is described below.

3. Scope of the review

- Sas.no/website
 - Website for purchasing flight tickets.
- Sas.no
- <https://www.sas.no/fly-med-oss/ungdomsbilletter/>
<https://www.sas.no/book/flights/>
<https://www.sas.no/book/travelers/>
<https://www.sas.no/book/seatmap>
<https://www.sas.no/book/extras>
<https://www.sas.no/book/payment>
- Testing was conducted 05.11.2021
- The natural language of the website is norwegian.

4 Website

We have checked the front page, the youth ticket ordering, the low price calendar, and the normal ordering sequence.

5 Review Process

We tested the website from different platforms and browsers. The website functions well in regards to the average user, but failed to meet accessibility standards for impaired users. We also tested the website with <https://www.accessibilitychecker.org/>

6.1 Results

- Front page:
The 8kg luggage link in the norwegian language layout, links to an english pop up.
The pop up is only written in english, so no matter what language you pick, you are still met with an english text.
- Ordering a ticket with keyboard and mouse does not have any problems.
- Ordering a ticket from the low price calendar, with only use of a keyboard:
It was possible to select tickets for one adult and a child using only the tab button.
After selecting the tickets however, it was not possible to proceed any further, because the “proceed” button could not be highlighted. As a result you can not actually purchase the ticket, and end up being stuck on the “choose flights” page.
This was tested on Microsoft Edge (previously Explorer).
- The same test was applied to Chrome. In this test, you could navigate the entire page and choose what cities you want to fly to, date and passengers. However you could not highlight any of the tickets after searching for the tickets, effectively leaving the user unable to proceed, like previously. If you click somewhere (anywhere) on the page with the mouse, you could then shuffle through the page and highlight the tickets. However, in Chrome you can actually highlight the proceed button at the bottom and continue on purchasing the ticket, using the keyboard only. After proceeding the user is prompted to input name and other personal information. After this, the user is supposed to choose seats, and after shifting into the seat selector(only worked for return flight), you can not leave it by using tab, which again leaves the user unable to proceed.
- Ordering a ticket from an Android phone went without a hitch, and the website performed as expected.

- There are also buttons and pictures without alternative text, this is most prominent on the front page, but there are still other pages where the problem occurs. There is also often missing header text, this could be used to point to where the user is at the moment

- The website contained no videos that we could find.

- Results from <https://www.accessibilitychecker.org/>: ARIA ID'S ARE NOT UNIQUE, LINKS DO NOT HAVE DISCERNIBLE NAME

This means that several elements share the same ID. This means that screen readers and other assistive technologies may only announce the first of the elements with the shared ID. As a result the other elements with shared ID will not be accessible to the user.

Some links in the website do not properly inform the user of what it actually does.

6.2 Recommended actions:

- The whole website should be rewritten to make it easier to navigate with a keyboard, since it is extremely hard to order a ticket at the website in its current state.
- There should be alternative text for every picture, button, link or header to make sure the user understands all functions, pictures, and how to navigate the site better. Text-to-speech could also be implemented as an addition to this alternative text.
- There was no text-to-speech function natively on the site, which could be very useful to impaired users.
- The website needs to update it's element ID's so that screen readers and other assistive technologies can function properly.

7. References

- [Web Content Accessibility Guidelines \(WCAG\) Overview](https://www.w3.org/WAI/intro/wcag)
<https://www.w3.org/WAI/intro/wcag>
- [Web Content Accessibility Guidelines 2.1](https://www.w3.org/TR/WCAG21/)
<https://www.w3.org/TR/WCAG21/>
- [Techniques for WCAG 2.1](https://www.w3.org/WAI/WCAG21/Techniques/)
<https://www.w3.org/WAI/WCAG21/Techniques/>
- [Accessibility Evaluation Resources](http://www.w3.org/WAI/eval/)
<http://www.w3.org/WAI/eval/>
- [Web Accessibility Evaluation Tools List](https://www.w3.org/WAI/ER/tools/)
<https://www.w3.org/WAI/ER/tools/>
- [Using Combined Expertise to Evaluate Web Accessibility](https://www.w3.org/WAI/eval/reviewteams)
<https://www.w3.org/WAI/eval/reviewteams>