Pilot study: Combining formal and peer education with FibroScan to increase HCV screening and treatment in persons who inject drugs

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BACKGROUND

In western countries, the largest population at risk for hepatitis C viral infection are persons who inject drugs (PWID). HCV screening and, when seropositive, treatment uptake is necessary in this population.

Despite safe and effective treatment options, good adherence of substance users to treatment, treatment uptake in substance users for HCV infection is low.

Previous studies successfully used formal education to increase HCV knowledge as well as to increase HCV screening and adherence to treatment. Several studies also used education by peers to educate and motivate substance users towards treatment, as it was significantly associated with HCV assessment, starting a treatment and achieving viral clearance (1,2,3,4,5,6).

A FibroScan test is a non-invasive method to measure the stiffness of the liver, indicative for the stage of liver fibrosis. The effect of FibroScan on treatment uptake is not studied yet.

The aim of this project was to study the effect of formal education combined with information by peer and FibroScan to inform and sensitize substance users, on HCV screening, initiation of HCV antiviral treatment and HCV specific knowledge in substance users.

MATERIALS & METHODS

Clients who receive opioid substitution in the Centre for Alcohol and Other Drug problems (CAD) in Limburg were included (N=52)

Subjects were randomized into 2 groups:

Control group (N=27):
- ‘Standard of care’ information brochure on Hepatitis C Virus (HCV)
- Questionnaires taken at baseline and one month after ‘standard of care’

Questionnaires contained info on:
- Patient characteristics
- Previously received info on HCV
- Willingness for HCV screening
- Willingness for treatment
- HCV knowledge

Intervention group (N=25):
- Information session on HCV: PPT presentation by care provider + peer
- FibroScan at ZOL, Genk
- Questionnaires taken at baseline, directly after the information session, one month after information and after FibroScan

RESULTS

Patient characteristics

<table>
<thead>
<tr>
<th>Characteristics</th>
<th>Control group (n=27)</th>
<th>Intervention group (n=25)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age mean ± SD (years)</td>
<td>40 ± 9</td>
<td>38 ± 9</td>
</tr>
<tr>
<td>Male (%)</td>
<td>74%</td>
<td>80%</td>
</tr>
<tr>
<td>Heterosexual (%)</td>
<td>96%</td>
<td>92%</td>
</tr>
<tr>
<td>Belgian origin (%)</td>
<td>56%</td>
<td>76%</td>
</tr>
<tr>
<td>Weight mean ± SD (kg)</td>
<td>74 ± 12</td>
<td>76 ± 18</td>
</tr>
<tr>
<td>Length mean ± SD (m)</td>
<td>1.73 ± 0.08</td>
<td>1.76 ± 0.10</td>
</tr>
<tr>
<td>Secondary school education (%)</td>
<td>56%</td>
<td>48%</td>
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<tr>
<td>Income by health insurance (%)</td>
<td>63%</td>
<td>64%</td>
</tr>
<tr>
<td>Living alone (%)</td>
<td>59%</td>
<td>56%</td>
</tr>
<tr>
<td>Rented house/flat (%)</td>
<td>60%</td>
<td>76%</td>
</tr>
<tr>
<td>Ever used IV drugs (%)</td>
<td>56%</td>
<td>80%</td>
</tr>
<tr>
<td>IV in last 3 months (%)</td>
<td>35%</td>
<td>60%</td>
</tr>
<tr>
<td>Sharing water for IDU (%)</td>
<td>27%</td>
<td>30%</td>
</tr>
<tr>
<td>Tattooed (%)</td>
<td>74%</td>
<td>60%</td>
</tr>
<tr>
<td>Blood transfusion (%)</td>
<td>30%</td>
<td>8%</td>
</tr>
<tr>
<td>Incarceration (%)</td>
<td>89%</td>
<td>80%</td>
</tr>
</tbody>
</table>

HCV knowledge

- Willingness for HCV screening (%): Baseline (n=27), After 1 month (n=25), After 3 months (n=21), After 6 months (n=13)
- Treatment (%): Baseline (n=27), After 1 month (n=21), After 3 months (n=8)
- Yes, but not now: Baseline (n=27), After 1 month (n=21), After 3 months (n=8)
- No, ever: Baseline (n=27), After 1 month (n=21), After 3 months (n=8)

CONCLUSION

One single information session significantly improves HCV knowledge but there was no effect on uptake for screening and treatment. The knowledge about HCV decreases after 3 months.

This intervention can be a good method to educate and sensitize substance users about HCV and can be applied to improve HCV management more often in different settings.

REFERENCES


Acknowledgements:
This study is a part of the Limburg Clinical Research Program (LCRP) of Hasselt University.
I would like to thank the clients and care providers of CAD and the Department of Gastroenterology and Hepatology of Ziekenhuis Oost-Limburg for helping and contributing to this project.