Pregnancy loss following chorionic villus sampling or amniocentesis in twin pregnancies: Two decades in a UK tertiary fetal medicine centre.

K Navaratnam, D Albloushi, Z Alfirevic, A Sharp University of Liverpool, UK

Introduction: Observational data indicate post-procedure miscarriages of <0.5% in singletons. Data for multiple pregnancies are limited.

Aim: Determine procedure-related complications in twin pregnancies following amniocentesis or CVS.

Methods: Retrospective cohort study; all CVS and amniocentesis performed in twins 2000-2019 at Liverpool Women’s Hospital. Cases with unspecified chorionicity were excluded.

Results:

<table>
<thead>
<tr>
<th>Procedure</th>
<th>Cases</th>
<th>Miscarriage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Amniocentesis</td>
<td>129</td>
<td>1.6% (n=2)</td>
</tr>
<tr>
<td>CVS</td>
<td>37</td>
<td>2.7% (n=1)</td>
</tr>
</tbody>
</table>

Structurally, chromosomally normal miscarriages

- Amniocentesis (n=0)
- CVS 2.7% (n=1)

Preterm birth <34 weeks within 2 weeks of procedure:

- Amniocentesis 2.3% (n=3)
- CVS (n=0)

Perinatal deaths

- Amniocentesis 5.4% (n=7)
- CVS 2.7% (n=1)

Conclusions

✓ Overall miscarriages similar for procedures in monochorionic and dichorionic twins
✓ Future studies should report chorionicity, punctures and needle gauge, to enable pooling of data and more accurate determination of risks in multiple pregnancies