SDP: Session Description Protocol

SDP/1

SDP

• not really a protocol – data carried by other protocols
• describes multimedia sessions
• several media streams
• used by SAP, SIP, RTSP, H.332, PINT

SDP/2
### SDP Information

<table>
<thead>
<tr>
<th>item</th>
<th>opt.?</th>
<th>description</th>
</tr>
</thead>
<tbody>
<tr>
<td>v</td>
<td></td>
<td>protocol version</td>
</tr>
<tr>
<td>o</td>
<td></td>
<td>owner/creator</td>
</tr>
<tr>
<td>c</td>
<td>*</td>
<td>connection information</td>
</tr>
<tr>
<td>s</td>
<td></td>
<td>session name</td>
</tr>
<tr>
<td>b</td>
<td>*</td>
<td>BW available/needed</td>
</tr>
<tr>
<td>z</td>
<td>*</td>
<td>time zone adjustment</td>
</tr>
<tr>
<td>k</td>
<td>*</td>
<td>encryption key</td>
</tr>
<tr>
<td>a</td>
<td>*</td>
<td>session attributes</td>
</tr>
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</table>

### SDP/3

### SDP Contact Information

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<thead>
<tr>
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<tbody>
<tr>
<td>i</td>
<td>*</td>
<td>session information</td>
</tr>
<tr>
<td>u</td>
<td>*</td>
<td>URI of description</td>
</tr>
<tr>
<td>p</td>
<td>*</td>
<td>phone number</td>
</tr>
<tr>
<td>e</td>
<td>*</td>
<td>email address</td>
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### SDP/4
SDP media description

<table>
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<tr>
<td>m</td>
<td></td>
<td>media name and transport address</td>
</tr>
<tr>
<td>i</td>
<td>*</td>
<td>media title</td>
</tr>
<tr>
<td>c</td>
<td>*</td>
<td>connection information</td>
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<tr>
<td>b</td>
<td>*</td>
<td>bandwidth (kb/s)</td>
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<tr>
<td>k</td>
<td>*</td>
<td>encryption key</td>
</tr>
<tr>
<td>a</td>
<td>*</td>
<td>media attributes</td>
</tr>
</tbody>
</table>

SDP example

v=0
o=g.bell 877283459 877283519 IN IP4 132.151.1.19
s=Come here, Watson!
u=http://www.ietf.org
e=g.bell@bell-telephone.com
c=IN IP4 132.151.1.19
b=CT:64
t=3086272736 0
k=clear:manhole cover
m=audio 3456 RTP/AVP 96
a=rtpmap:96 VDVI/8000/1
m=video 3458 RTP/AVP 31
m=application 32416 udp wb
a=orient:portrait
SDP issues

- can’t describe alternatives (“English or French”)
- can’t indicate preferences
- receive capabilities only
- not rich enough for multimedia presentations
- scheduling ≠ vcalendar