



SDP offer/answer for file transfer

draft-ietf-mmusic-file-transfer-mech-03.txt

IETF 69, MMUSIC WG

July 2007

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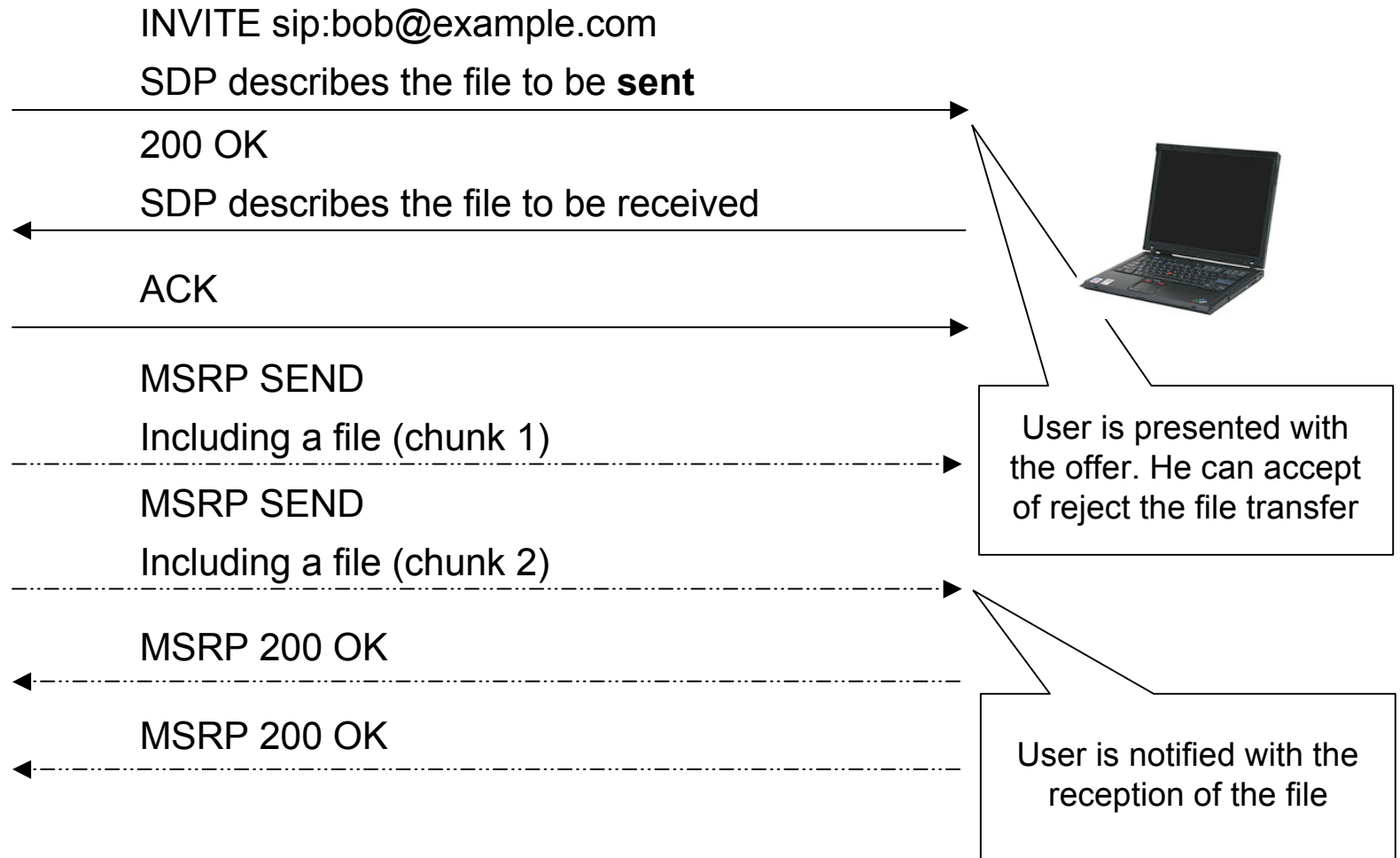
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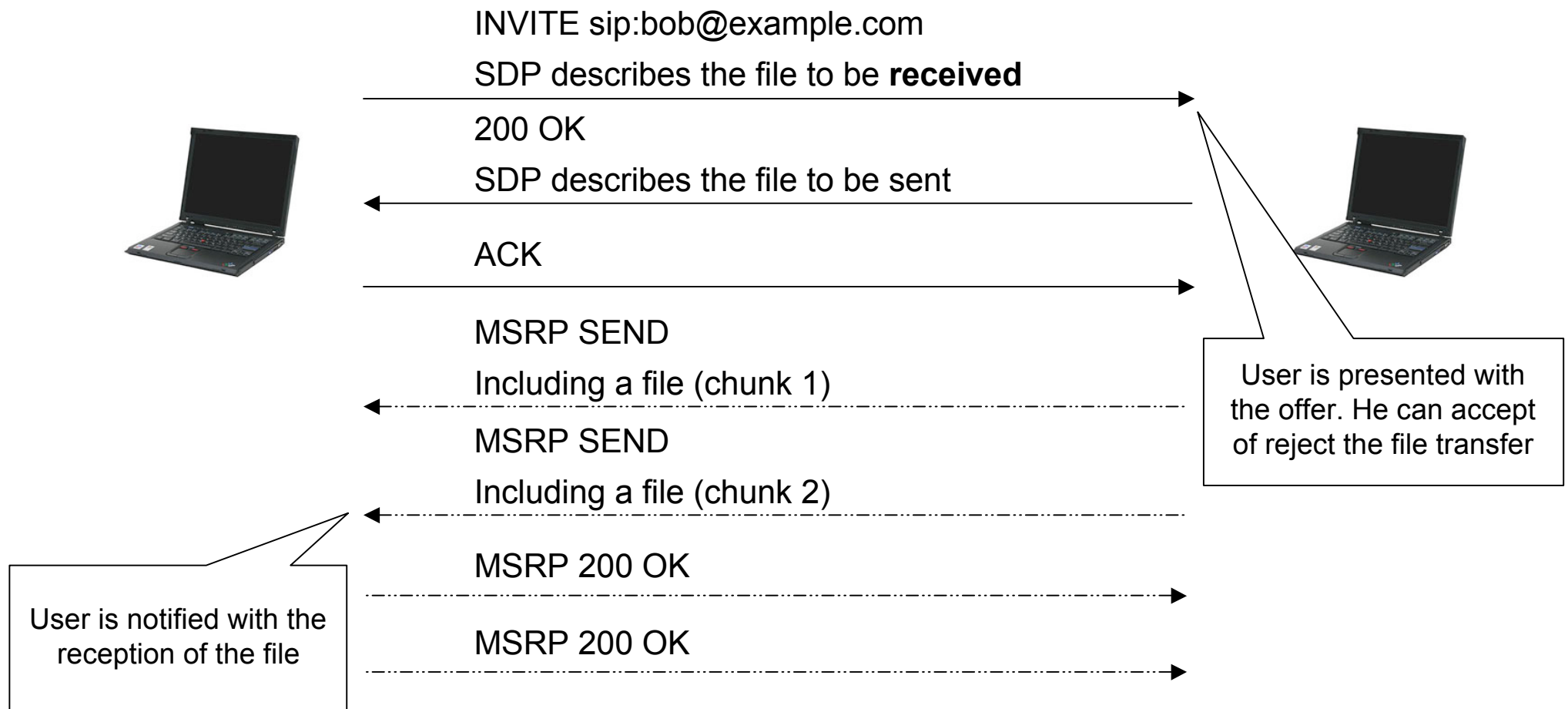
Summary


- Mechanism to **pull** or **push** a file from/to a remote endpoint.
- Provides a description of a file in an SDP offer
 - Allows the SDP answerer to accept or to reject the offer before the actual transfer starts.
- Uses MSRP to do the actual transfer. MSRP messages carry the usual MIME container describing the file to be transferred.
- Mimics similar functionality in commercial presence and instant messaging systems.

File transfer: push operation



File transfer: pull operation





Example

v=0

o=alice 2890844526 2890844526 IN IP4 alicepc.example.com

s=

c=IN IP4 alicepc.example.com

t=0 0

m=message 7654 TCP/MSRP *

i=This is my latest picture

a=sendonly

a=accept-types:message/cpim

a=accept-wrapped-types:*

a=path:msrp://alicepc.example.com:7654/jshA7we;tcp

a=file-selector:name:"My cool picture.jpg" type:image/jpeg

size:4092 hash:sha-1:

72:24:5F:E8:65:3D:DA:F3:71:36:2F:86:D4:71:91:3E:E4:A2:CE:2E

a=file-transfer:new

a=file-disposition:render

a=file-date:creation:"Mon, 15 May 2006 15:01:31 +0300"

a=file-icon:cid:id2@alicepc.example.com



Changes in version -03

- New attribute *a=file-transfer* with values *new/existing*
 - Used to distinguish if the SDP offer is requesting a new file transfer (or re-start), or if it is a copy of the SDP (e.g., re-INVITE, session-timer, etc.)
- *a=file-disposition* values
 - Now using existing values *render* and *attachment*
- ABNF fixed in several places
- Encoding of the hash algorithm changed to be the same as the *fingerprint* attribute of RFC4572.
hash:sha-1:72:24:5F:E8:65:3D:DA:F3:71:36:2F:86:D4:71:91:3E:E4:A2:CE:2E
- Handling of several hashes with different algorithms
 - Multiple hashes are possible in both offers and answers
 - File sender computes values locally (not copied from SDP offer)
- Clarifications on the usage of the max-size attribute (MSRP)
- A number of other minor comments



Issue: message/cpim wrapper

- The draft does not mandate the usage of message/cpim. Should we have strong MUST use message/cpim wrapper?
 - Message/cpim support can be learnt via SDP (a=accept-types)
 - Useful to have (provides sender recipient addresses), but not compelling reason
 - MSRP mandates implementation of message/cpim, but not its usage
- Proposal: refer to MSRP, message/cpim is mandatory to implement.



Issue: aborting existing file transfer

- *file-transfer* attribute controls whether the SDP describes a new or existing file transfer
 - *new* -> let's do the transfer of the file
 - *existing* -> don't do anything, this is an SDP repetition.
- Assume a file transfer is taking place. Now, the SDP offer/answer is repeated, still preserving the "new" value in the a=file-transfer attribute. The file transfer is aborted and restarts.
- Behavior copied from the *connection* attribute in RFC 4145
- Is this the desired behavior?
 - Sloppy implementations may unconsciously abort file transfers if they repeat SDP.



Status

- 3 versions since IETF 68
- Drafts substantially revised and discussed in the MMUSIC WG.
- Recent review of version -03 in the Apps-review team
- Lots of feedback from GSMA Image Sharing interoperability test
 - Feedback has got into versions -02 and -03
 - Some comments were related to the MSRP specification
- No major open issues
 - But a substantial number of errors and request for clarifications
 - Should have a review checking for consistency
- Essentially, the draft is done
- **Next Steps:** version -04 to be submitted after this IETF meeting -> WGLC.
- **Announcement:** discussion of related file directory drafts in SIPPING on Thursday 1300-1500
 - [draft-garcia-sipping-file-sharing-framework-00.txt](#)
 - [draft-garcia-sipping-file-event-package-00.txt](#)
 - [draft-garcia-sipping-file-desc-pidf-00.txt](#)