

FTP Server #1

Week #8

File Transfer Protocol

- FTP Commands

- USER username CRLF \r\n
 - FTP user name 전송
- PASS password CRLF
 - Client는 file 전송을 요청함 (수신 or 송신)
- NLST CRLF
 - File 혹은 directory 리스트 요청
- PASV CRLF
 - Passive 모드에서 Port 요청
- RETR filename CRLF
 - 파일 다운로드 (수신 요청)
- CWD directory CRLF
 - Directory 이동
- QUIT CRLF
 - FTP session 종료
- TYPE I/A CRLF

- FTP Response Codes

- 100
 - 요청 커맨드 시작
- 200
 - 요청 커맨드 수행 성공
- 300
 - 요청 커맨드 수신 완료, 정보 부족 보류 상태
- 400
 - 요청 커맨드 일시적 처리 실패, 다시 요청
- 500
 - 요청 커맨드 처리 실패

FTP Server 구현

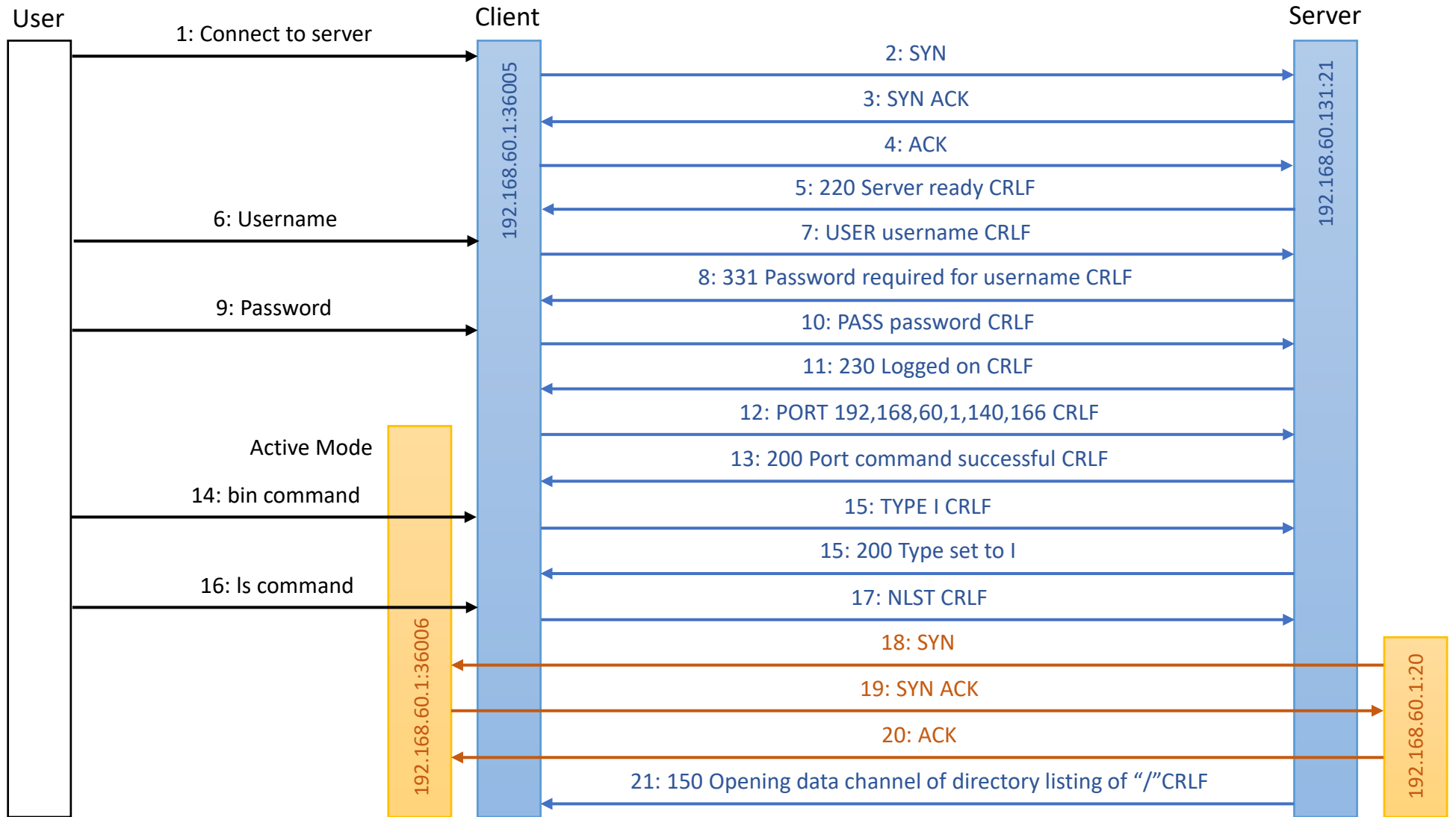
- FTP Client
 - Active Connection Mode
 - 구현 FTP 커맨드
 - USER, PASS, CWD, NLST, QUIT, PASV, RETR, TYPE
 - 구현 응답 메시지 처리
 - 150, 200, 220, 221, 226, 227, 230, 250, 331

File Transfer Protocol

FTP

Connection

- Active Mode
- bin command
- ls Command

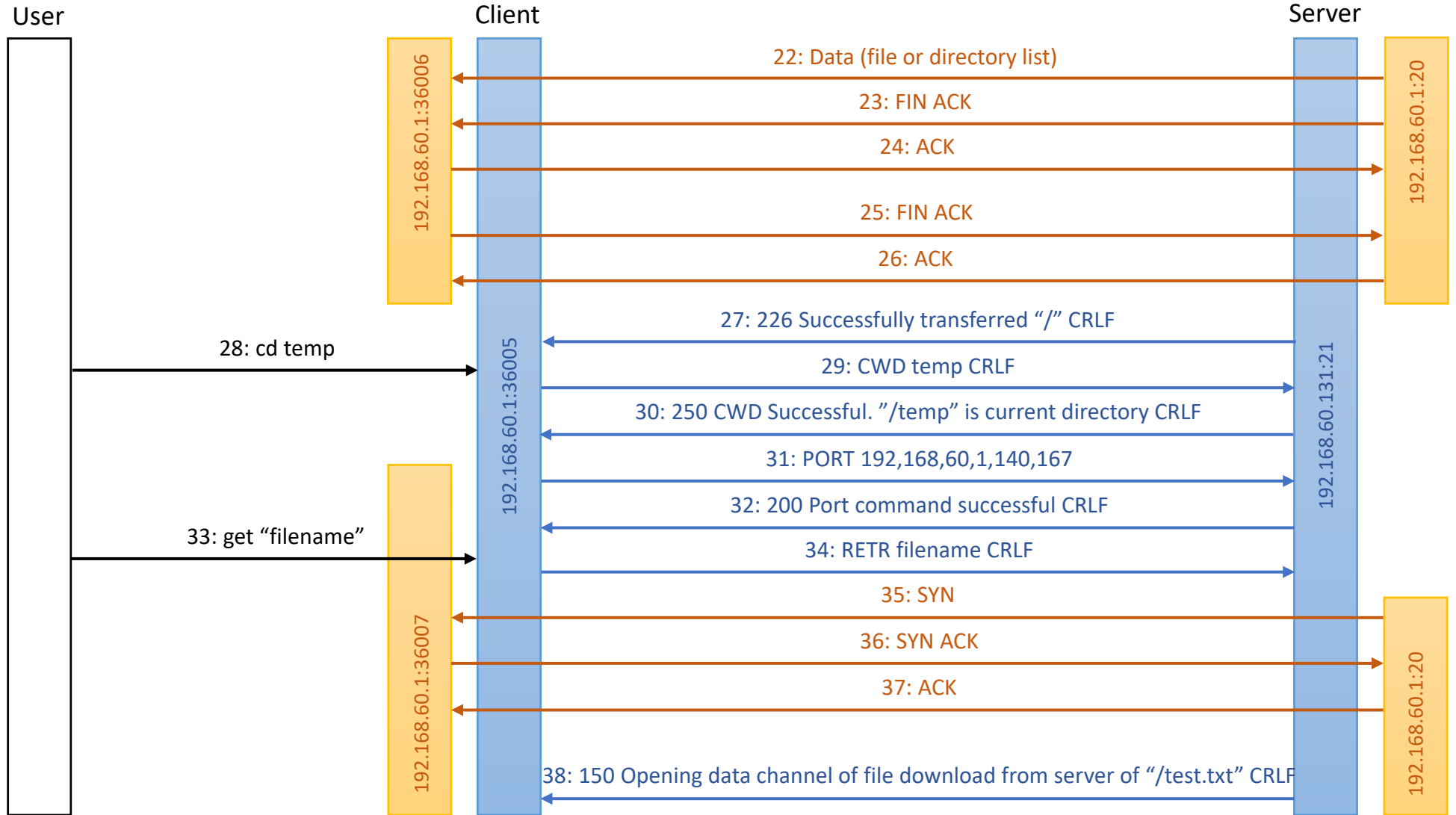


File Transfer Protocol

FTP

Connection

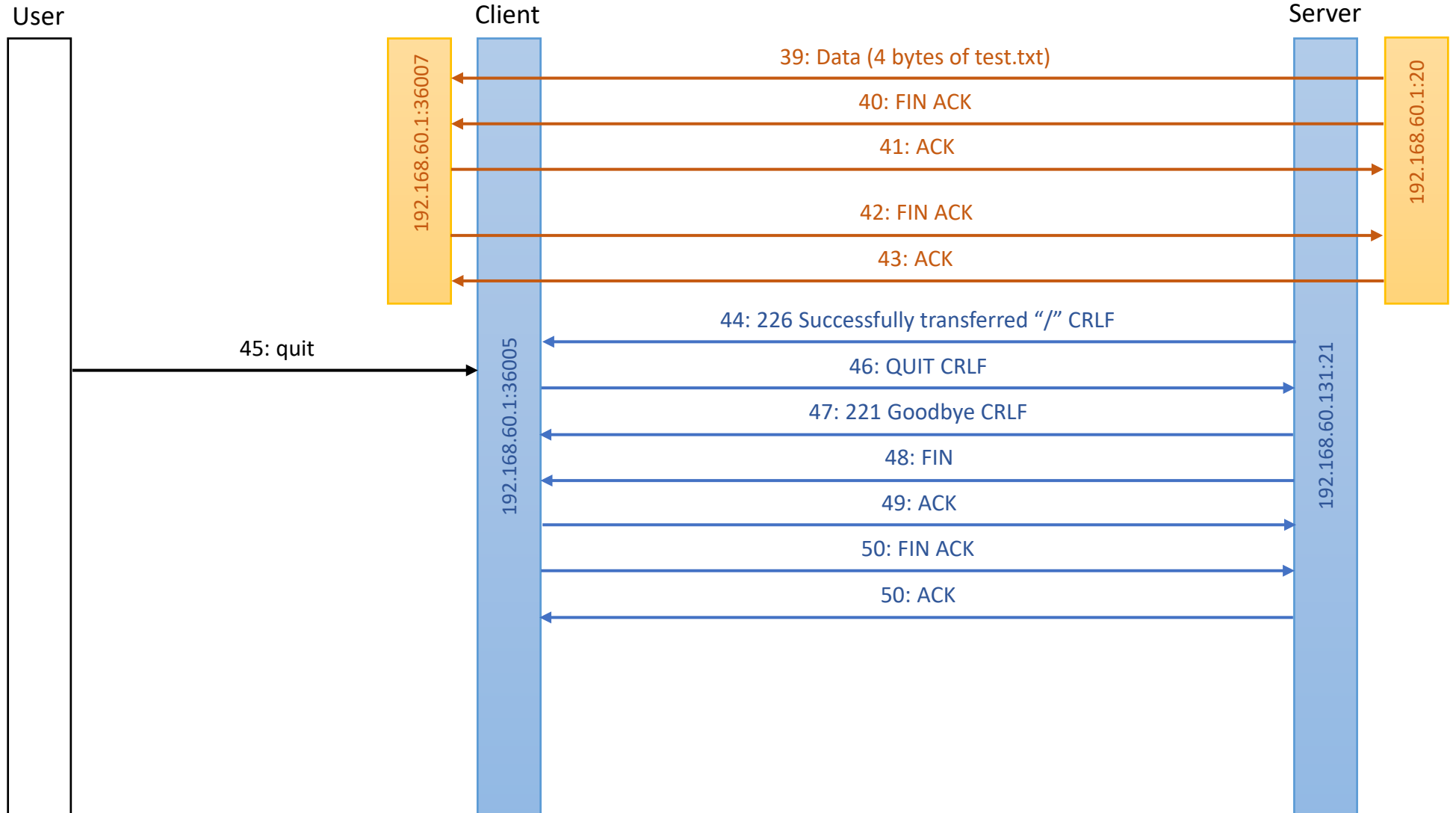
- Active Mode
- ls Command
- cd Command
- get Command



File Transfer Protocol

FTP
Connection
- Active Mode
- get Command

Close connection

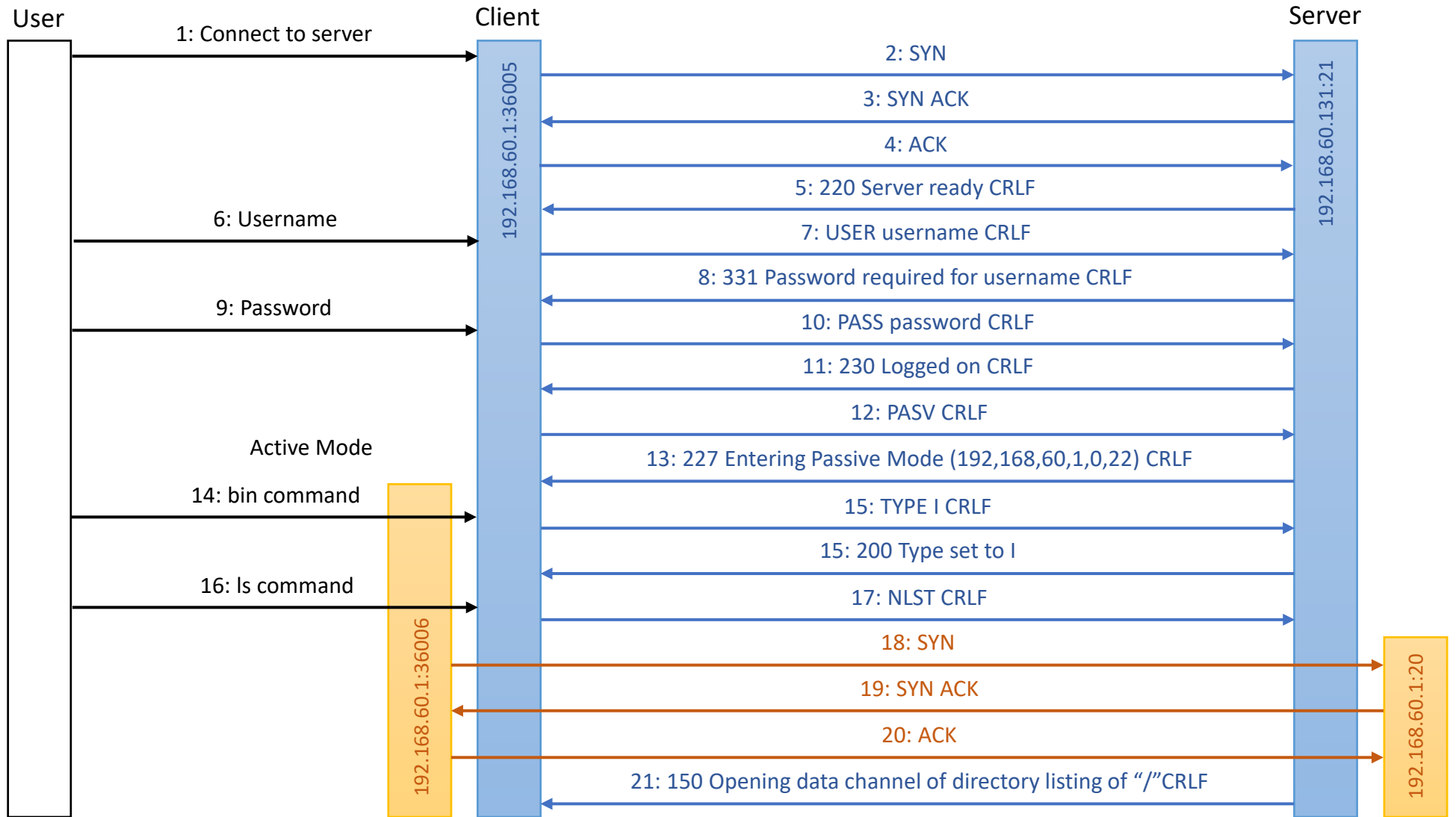


File Transfer Protocol

FTP

Connection

- Passive Mode
- bin command
- ls Command

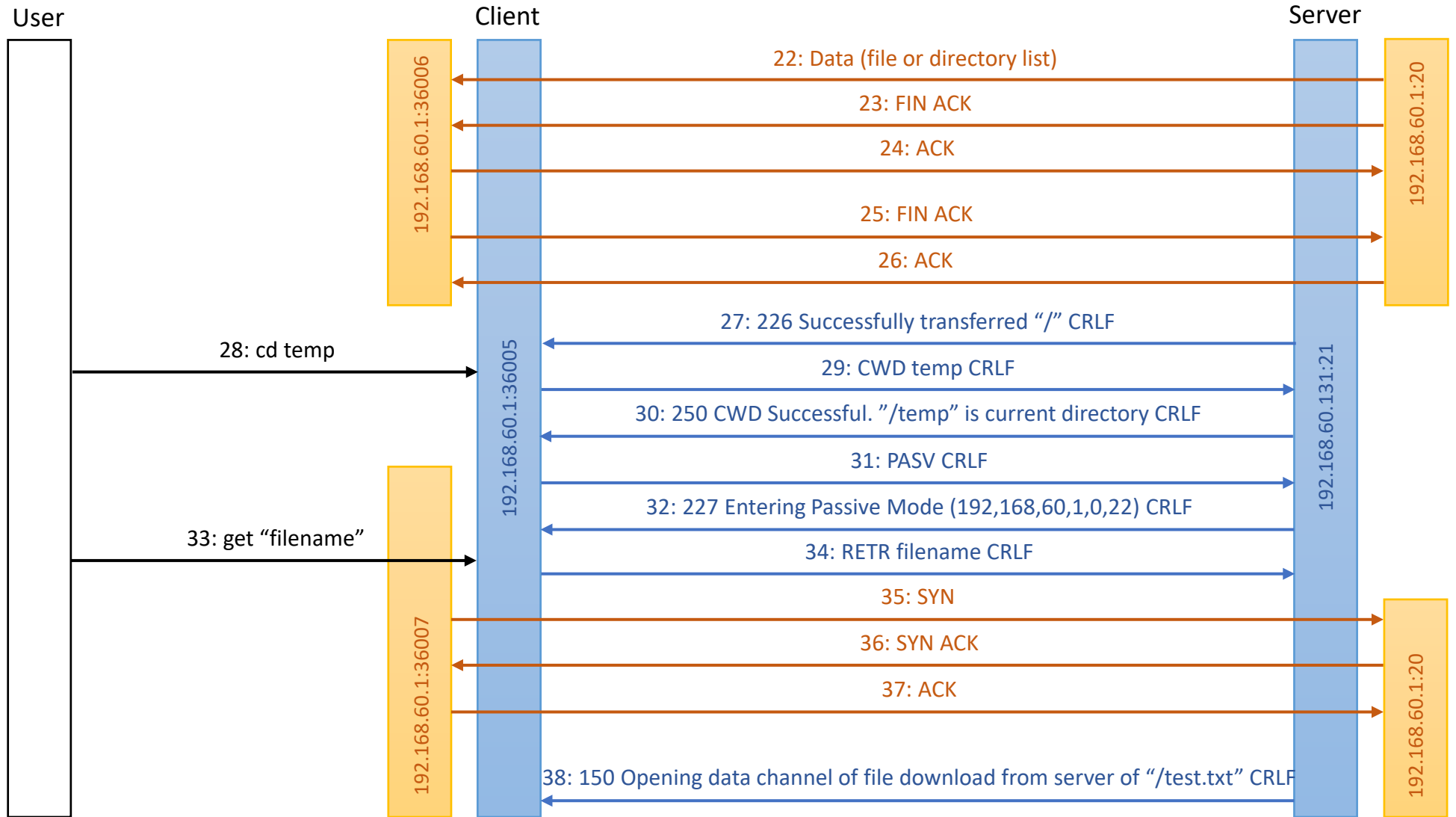


File Transfer Protocol

FTP

Connection

- Passive Mode
- ls Command
- cd Command
- get Command



File Transfer Protocol

FTP
Connection
- Passive Mode
- get Command

Close connection

