OSI Model with Protocol Examples and UDP Mapping

Layer	Name	Description	Protocol Examples	Relevance to UDP Chat App
7	Application	Interface for user and application logic	HTTP, FTP, DNS, DHCP	Chat message formatting and logic
6	Presentation	Data translation (encryption, compression)	SSL/TLS, ASCII, JPEG	Handled manually in simple apps like this
5	Session	Session control and synchronization	NetBIOS, RPC	Stateless in UDP, session logic in code
4	Transport	End-to-end communication	TCP, UDP	UDP used for sending/receiving messages
3	Network	Routing and IP addressing	IP, ICMP	Used via socket API for IP communication
2	Data Link	MAC addressing and framing	Ethernet, Wi-Fi	Handled by Linux kernel & drivers
1	Physical	Transmission medium	Ethernet cables, Wi-Fi radio	Hardware layer, outside of app control