



D
(from banks short of
reserves)

Federal Funds



i

S (from banks with
excess reserves)



The Federal Funds Market















d





b

U









S

S











2





S





A large, stylized red letter 'S' is centered on a white background. The letter has a thick, slightly irregular stroke, giving it a hand-drawn or 3D-printed appearance. It features a soft, gray shadow cast to its right and slightly forward, creating a sense of depth. The overall image is simple and minimalist.





a













































S





V





R

[REDACTED]

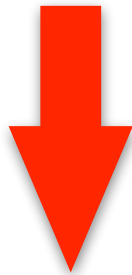
[REDACTED]







Banks with excess
reserves lend these
reserves to banks short
of reserves



These loans are made by **banks to banks** (the public is not involved), must be made **right away** and are made for a short period of time: **overnight**



T























24















S







24



S



S

2













b

a

















9







a



















F









R





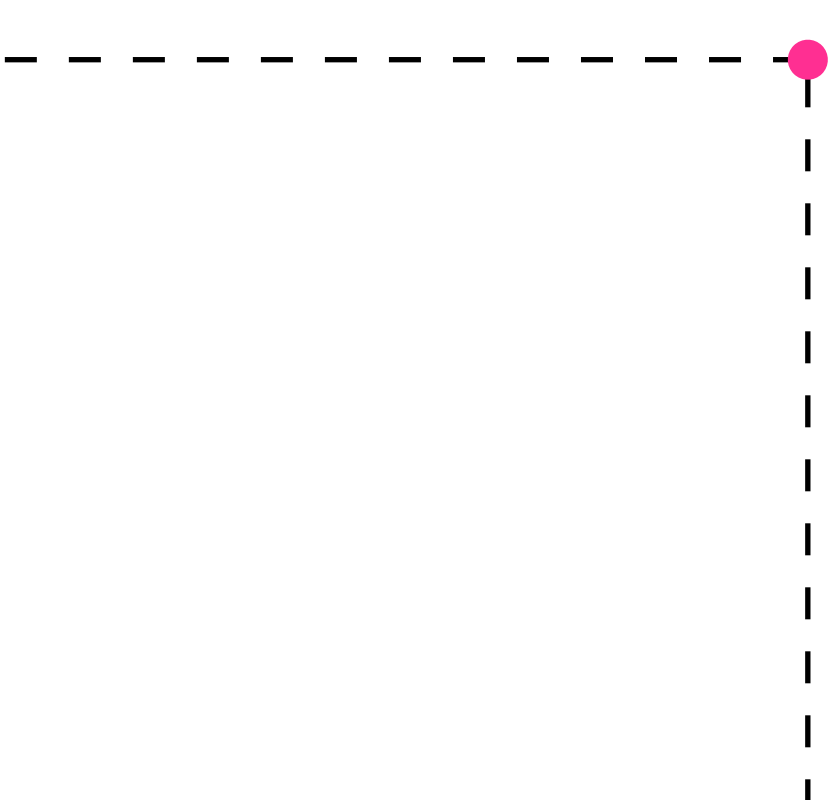








ffr_e



A horizontal dashed line connects the label ffr_e to a pink dot. From the pink dot, a vertical dashed line extends downwards to the label $Q^s = Q^d$.

$Q^s = Q^d$



















b

24







2



















m









b

V

S









V

2











24









B

6





S





















2







S



W





























g





S





2







B

2





S

b









W







mm







b

2







S



W





























W



S





2





Eventually this market
settles at an equilibrium
interest rate



At the end of business
day, banks must have the
required amount of
reserves $R = r^*D$

The interest rate on
these loans is an
interbank overnight rate

Federal Funds Rate

ffr

This interbank rate is
determined by supply
and demand:



Banks **lend** to the
bank(s) which offer the
highest rate



Banks **borrow** from
the bank(s) which offer
the **lowest** rate

The Federal Funds Market

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D (from banks short of
reserves)

Federal Funds

$Q^s = Q^d$

ffr_e

At the end of business
day, banks **must have** the
required amount of
reserves $R = r \cdot D$

Banks with **excess
reserves** **lend** these
reserves to banks **short
of reserves**



These loans are made by **banks to
banks** (the public is not involved),
must be made **right away** and are
made for a short period of time:
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