

Bounce Management

Bounce management or bounce handling refers to the processing of returns, also known as non-delivery notification or non-delivery report (NDN or NDR), in email transmission. The aim is to remove unreachable addresses from the mailing lists. A distinction is generally made between soft bounces and hard bounces. Since bounce management falls within the scope of list hygiene, it is the task of the brand to process bounces. However, a professional ESP largely relieves the brand of this work with automatic tools.

How do soft bounces differ from hard bounces?

A soft bounce always refers to a temporary error where a renewed attempt should be made to send the email at a later time. A classic case of a soft bounce is a full mailbox or where the receiving mail server is currently over quota.

In contrast, a hard bounce is a permanent error and a new attempt at delivery should be avoided if possible. A typical hard bounce occurs, for example, upon writing to a non-existent address.

In theory, identifying whether a return is a soft or hard bounce is very simple. The receiving mail server returns a status code to the sending mail server. If this status code starts with a 4, it is a temporary error - i.e., a soft bounce. If the status code starts with a 5, it is a permanent error, a hard bounce. In practice, it's a little more complicated than this. As such, it is always advisable to pay attention to the corresponding bounce message. A "550 sorry, no mailbox here by that name" is clearly unambiguous and the recipient should definitely be removed from the distribution list. On the other hand, with a "554 Error writing message to safe storage; message could not be stored to disk", there may be a hardware defect at the recipient's end, which will hopefully be fixed in due course, meaning that a later dispatch could well be successful.

Why should I take bounces seriously?

Particularly in view of the last point, the question naturally arises as to why bounces should be removed at all, if even with an apparent hard bounce a later delivery could be successful. There are several answers to this question. Firstly, you want to keep your mailing lists clean and only write to valid and interested recipients. In addition, large

email providers with multiple mailboxes pay attention to the bounce rate, i.e. the proportion of emails from a sender that are rejected with a bounce message. This is one of the reasons why the CSA criteria require a hardbounce rate of 1% maximum. If the bounce rate is too high in the eyes of the email provider, the impression arises that the sender is not working cleanly or is even sending spam and, ultimately, the sender could be completely blocked. Last but not least, old email addresses that are no longer used often become spam traps. To ensure that a reputable sender does not inadvertently write to such a spam trap, these unused addresses usually respond with a hard bounce for at least 6 months, and only then become active as spam trap. A legitimate sender has enough time to remove the address from the distribution list due to the hard bounce and will not write to the address once it has been reconfigured to a spam trap.

What do I need to do?

Orderly bounce handling is essential for the quality of the mailing lists and for ensuring good delivery. Always process bounces immediately and ideally automatically. If you are unsure about whether it is really a hard bounce or just a temporary error, you should take the address out of the mailing list to avoid reputation damage and delivery problems. In all cases, remove the address from the list at the latest after 3 hard bounces.

To prevent bounces from becoming a problem in the first place, the double opt-in procedure is recommended when registering receivers.

Authors: Technical Team of the Certified Senders Alliance