DEFECT REPORT FORM

1.   Defect Report Number: 208

2.   Source: IETF IDS working group

3.   Addressed to: ISO/IEC/JTC1/SC21/WG8 and ITU-T Study Group VII Editor
                       Group on the Directory

4.   (a)   WG Secretariat:
      (b)   ITU-T WP: WP4

5.   Date Circulated by WG Secretariat:

6.   Deadline for Response from Editor:

7.   Defect Report Concerning:
      (number and title of IS or DIS final text/ITU-T Recommendation)

      X.525/ ISO 9594-9 (1993) The Directory - Replication

8.   Qualifier: (e.g: error, omission, clarification required)
              Omission

9.   References in Document: (e.g.: page, clause/section, figure, and/or table
      numbers)

      7.2.2.3 and 9.2.4.1

10.   Nature of Defect: (complete, concise explanation of the perceived
                              problem)
      The List operation may be carried out in a superior DSA using subordinate
      reference information, providing that the *fromEntry* flag is set to false in the
      response. However, in order to do this securely, complete access control
      information is needed for the RDN of the subordinate entry. The existing text
      assumes that this is held in entry ACI (e.g. see 9.2.4.1 c) or in prescriptive
      ACI held in subentries *above* the DSE (e.g. see 9.2.4.1 b). In the case of a
      subordinate reference, the prescriptive ACI may be held *below* the DSE, if the
      subordinate reference points to a new administrative point. The shadowing
      document needs to make it clear that this can be the case, and needs to allow
      for this additional access control information to be shadowed.

      A related defect report (140) has already suggested that this same omission
      should be added to operational bindings.

11. Solution Proposed by the Source: (optional)

All the following changes are to X.525|ISO 9594-9.

I) Insert the following text into 7.2.2.3, at the end of both the second paragraph and the first sentence of the third paragraph (after appropriate knowledge):
and access control information.

II) Insert a new third paragraph into 7.2.2.3:
If subordinate knowledge is supplied, and the supplying DSE (of type **subr)** is also of type **admPoint**, then the SDSE shall additionally be of type **admPoint** and the **administrativeRole** attribute shall be supplied. If such a DSE has any immediately subordinate subentries containing **PrescriptiveACI** relating to the administrative point, then they shall also be supplied as SDSEs in the shadowed information.

Note. A DSE can be of type **subr** and **admPoint** in a superior DSA, when the naming context in the subordinate DSA is the start of a new administrative area.

III) Update figure 3 to show a subentry immediately below a subordinate reference. The subentry contains prescriptiveACI and is part of the shadowed information.
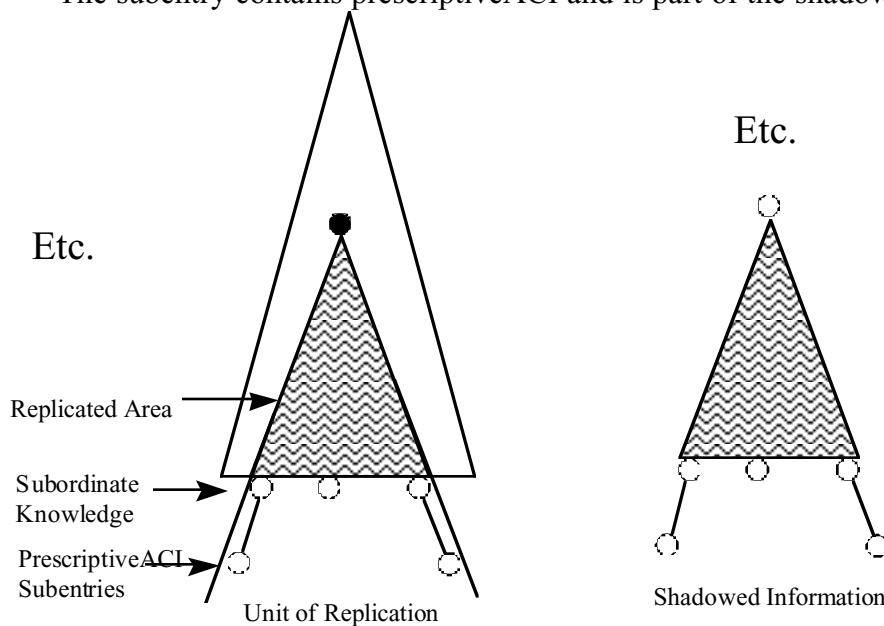
Additions to Figure 3, Section 7.2, X.525

IV) Add supporting text to section 7.2 in the paragraph after Figure 3. Insert after the sentence Subordinate knowledge may also be replicated the following sentences Implicit in the subordinate knowledge is the access control information which governs access to the RDN of the subordinate knowledge. When the subordinate entry is an administrative point in another DSA, then part of this access control information may be held in **prescriptiveACI** subentries beneath the subordinate knowledge.

V) Add a new point d) to 9.2.4.1:

if subordinate knowledge (not extended knowledge) is shadowed then any **prescriptiveACI** in subordinate subentries shall also be copied.

12.   Editor's Response:
       (any material proposed for processing as an erratum to, an amendment to, or a commentary on the IS or DIS final text/CCITT Recommendation or Draft Recommendation is attached separately to this completed report).