The cervical smear record: its relevance to the subsequent development of cervical neoplasia.

Bertelsen B, Hartveit F.
Gade Institute, Department of Pathology, University of Bergen, Haukeland Hospital, Norway.

ABSTRACT

BACKGROUND: Our aim was to investigate the previous smear history in women with cervical intraepithelial neoplasia grade 1-3 or squamous carcinoma and define its relevance to the lesion present in 1989.

METHODS: All 850 women with a laboratory record of cervical intraepithelial neoplasia or cervical squamous carcinoma in 1989 were studied. We retrieved their cytological and histological cervical diagnoses for the period 1981 to 1992 from the laboratory files. On this basis we assessed their previous smear history and short term clinical outcome.

RESULTS: Half the women had a negative record prior to 1989, irrespective of the grade of their lesion in that year. Cervical intraepithelial neoplasia grade 1 had previously been found in 16%, grade 2 in 10%, and grade 3 in 7%. These levels were not related to the grade present in '89, but as in those with a negative record, were proportional to the number of women examined, and thus reflect the frequency of such lesions in the screened population in general. In all, 310 were treated operatively for cervical intraepithelial neoplasia grade 3 following abnormal findings in 1989. In such cases abnormal findings were also common in '88, although 45% of them still had a negative smear history. The group with no previous record, i.e. unscreened, contained significantly more invasive cases.

CONCLUSIONS: In women with cervical intraepithelial neoplasia in 1989, their previous smear history did not indicate the grade of lesion present. The relevance of their previous abnormal slides to that lesion is thus questionable. The findings, however, suggest that progressive lesions may be acute in origin, superimposed in some cases on a history of similar morphological abnormalities.