LIPOMODELLING OUTCOMES AND COMPLICATIONS IN A UK ONCOPLASTIC SERVICE

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Introduction: Lipomodelling has been increasingly adopted as an adjunct to oncoplastic surgery in the past decade to improve cosmetic outcomes and tissue quality after both breast conservation and breast reconstruction. Low and high volume techniques may be used depending on whether volume of shape symmetry are the desired outcome. This audit has evaluated the indications for and outcomes of lipomodelling in a large UK district hospital based oncoplastic service following its introduction 6 years ago.

Methods: Consecutive cases of lipomodelling were retrospectively audited by case note review according to a standardised proforma between 2010 and 2016.

Results: 59 cases of lipomodelling were performed with a median age of 55 (range 32-68). Indications were 76\% for indentation or contour adjustment, 9\% pure volume symmetrisation and 6\% to improve mastectomy flap thickness and quality before delayed reconstruction. Just under half (44\%) had lipomodelling to adjust conservation surgery cosmesis, the rest to adjust breast reconstruction. 61\% of patients had undergone prior radiotherapy. The lipomodelling was performed using the Coleman technique in 85\% of cases and large volume lipomodelling in 15\%. The majority of cases were day cases (77\%) or overnight stay (19\%) with only one case (2\%) requiring longer admission due to donor site pain.

Outcomes were good with 88\% of cases having no recorded injection site complications (12\% had subsequent fat necrosis or oil cysts reported). Similarly 64\% had no problems with the donor site (27\% complained of donor site pain or bruising, 1 (2\%) haematoma and 1 (2\%) donor site tethering). There was no difference in rates of donor site complications between women who had or had not had prior radiotherapy (11\% versus 11\% rate of fat necrosis). There were 2 cancer local recurrences: one colocalised with the site of lipomodelling, one at a remote location in the breast. Patients were satisfied with the outcome in 90\% of cases with only 10\% unhappy with the outcome (rated as poor), with a slightly higher rate of poor outcomes in women who had RT (16\% poor outcomes, but the small sample size precluded statistical interpretation).

Conclusion: Lipomodelling is a safe and effective adjunctive technique to oncoplastic surgery with a low rate of complications and high patient satisfaction.