Management of patients with metastatic colorectal cancer in Lebanese hospitals and associated direct cost: a multicenter cohort study.

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BACKGROUND: For metastatic colorectal cancer a series of novel therapies has emerged during the last decade but their use in routine clinical practice and their costs are not well documented.

AIMS: This study evaluated the clinical effectiveness of metastatic colorectal cancer patients in Lebanese oncologic units and estimated the costs.

METHODS: A prospective cohort study was conducted on metastatic colorectal cancer patients during 2008-2013. The type of medical management, overall survival and total costs from diagnosis to death were described. Cost analysis was performed using tariffs from 2013 in US dollars.

RESULTS: One hundred and seventy-nine metastatic patients were selected among which 84.9% had colorectal cancer involvement. The average follow-up from diagnosis until death or the latest news was 34.8 months. Around 49.7% were still alive at last follow-up date. Three lines of treatment accounted for 4.5%, 39.6% and 55.9% with an average duration of 14.5, 11.4 and 14.6 months respectively. A 73.2% of patients benefited from targeted therapy. The median overall survival was 20.8 months. The mean total costs of drugs was $22 256 in patients with standard therapy alone whereas the cost increased to $80 396 after the addition of targeted therapy. The mean global total cost was estimated at $64 805 per patient (min $3703; max $304 086).

CONCLUSIONS: Targeted therapy associated to standard therapy is highly prevalent in Lebanon in metastatic disease and the associated medical cost substantial. This study is the first to show the clinical effectiveness and costs of targeted therapy in patients with metastatic colorectal cancer.

KEYWORDS: cost; cytotoxic agents; effectiveness; metastatic colorectal cancer; targeted therapies