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Resumo	Breast cancer remains the most prevalent cause of cancer mortality in woman worldwide due to the metastatic process and therapy resistance. Resistance against cancer therapy is partially attributed to cancer stem cells (CSCs). These cells arise from epithelial cells undergoing epithelial-to-mesenchymal transition (EMT) and might be responsible for tumor recurrence. In this study, we reported the relevance of miR-155 upregulation in chemoresistant cells associated with EMT. Notably, we found miR-155 induction in exosomes isolated from CSCs and resistant cells, followed by resistant cells' exosome transfer to the recipient sensitive cells. Functionally, miR-155 mimic assay showed an enrichment in miR-155 from exosome concomitant with miR-155 exosome transfer to breast cancer cells. In parallel to these effects, we also observed EMT change in miR-155 transfected cells. The chemoresistance phenotype transfer to sensitive cells and the migration capability was analyzed by MTT and scratch assays and our results suggest that exosomes may intermediate resistance and migration capacity to sensitive cells partly through exosome transfer of miR-155. Taken together, our findings establish the significance of exosome-mediate miR-155 chemoresistance in breast cancer cells, with implications for targeting miR-155 signaling as a possible therapeutic strategy.
Fomento	