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(54) Title: COMPOSITIONS CONTAINING, METHODS INVOLVING, AND USES OF NON-NATURAL AMINO ACID LINKED DOLASTATIN DERIVATIVES

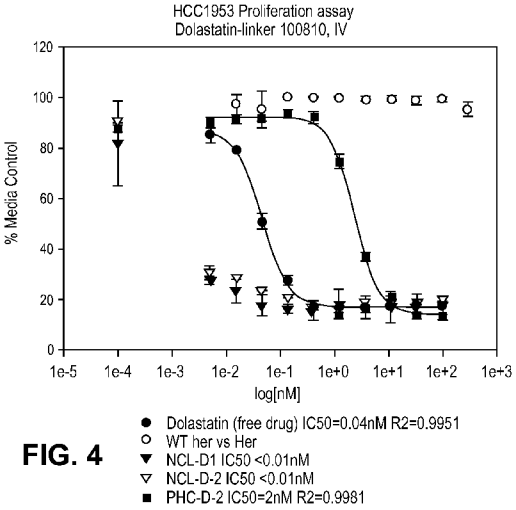

FIG. 4

(57) Abstract: Disclosed herein are non-natural amino acids and dolastatin analogs that include at least one non-natural amino acid, and methods for making such non-natural amino acids and polypeptides. The dolastatin analogs can include a wide range of possible functionalities, but typically have at least one oxime, carbonyl, dicarbonyl, and/or hydroxylamine group. Also disclosed herein are non-natural amino acid dolastatin analogs that are further modified post-translationally, methods for effecting such modifications, and methods for purifying such dolastatin analogs. Typically, the modified dolastatin analogs include at least one oxime, carbonyl, dicarbonyl, and/or hydroxylamine group. Further disclosed are methods for using such non-natural amino acid dolastatin analogs and modified non-natural amino acid dolastatin analogs, including therapeutic, diagnostic, and other biotechnology use.

WO 2012/166560 A1

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