function f_search(character varying)

This function takes a character input $search_string and returns a table containing ICD codes where the ICD code is a pattern match for $search_string.

select f_search('diabet')

returns
"(E10,E10,"Insulin-dependent diabetes mellitus")"
"(E10.0,E100,"Insulin-dependent diabetes mellitus With coma")"
"(E10.1,E101,"Insulin-dependent diabetes mellitus With ketoacidosis")"
"(E10.2,E102,"Insulin-dependent diabetes mellitus With renal complications")"
"(E10.3,E103,"Insulin-dependent diabetes mellitus With ophthalmic complications")"
"(E10.4,E104,"Insulin-dependent diabetes mellitus With neurological complications")"

...

SELECT f_search(
  'L%melan'
);

"(L81.4,L814,"Other melanin hyperpigmentation")"
"(L81.6,L816,"Other disorders of diminished melanin formation")"

The actual text searched is the concatenated code, alt code, description, modifier_4 and modifier_5.

```
-- Function: f_search(character varying[])

-- DROP FUNCTION f_search(character varying[]);

CREATE OR REPLACE FUNCTION f_search(IN search_string character varying)
  RETURNS TABLE(code character varying, alt character varying,
description text) AS
$BODY$

SELECT
  t_icd10.code as code,
  t_icd10.alt_code as alt,
  t_icd10.description || case when modifier_4>'' then ' ' else '' end ||
modifier_4 || case when modifier_5>'' then ' ' else '' end || modifier_5
as description

FROM
  public.t_icd10



WHERE
  t_icd10.code || cast(' ' as text) || t_icd10.alt_code || cast(' ' as
text) || t_icd10.description || ' '::text || modifier_4 || ' '::text ||
modifier_5::text like '%' || $1::text || '%'

$BODY$
```

```
  LANGUAGE sql VOLATILE
  COST 100
  ROWS 1000;
ALTER FUNCTION f_search(character varying)
  OWNER TO accelrtdb;
COMMENT ON FUNCTION f_search(character varying) IS 'search function,
accepts a string which may contain wildcards as search string,pre/appends
% and then looks for matches in the database

Note - the function could be suceptible to SQL injection attacks and the
search string will need to be cleaned of SQL reserved words in future
versions';
```