Рисунок 1 – ER-диаграмма базы данных master_floor

```sql
BEGIN;


CREATE TABLE IF NOT EXISTS public.material_types
(
    type_id serial NOT NULL,
    material_type character varying(255) COLLATE pg_catalog."default" NOT
NULL,
    defect_percentage numeric(5, 4) NOT NULL,
    CONSTRAINT material_types_pkey PRIMARY KEY (type_id)
);

CREATE TABLE IF NOT EXISTS public.materials
(
    material_id serial NOT NULL,
    material_type_id integer,
```

```sql
        material_name character varying(255) COLLATE pg_catalog."default" NOT
NULL,
        supplier character varying(255) COLLATE pg_catalog."default",
        purchase_price numeric(10, 2),
        stock_quantity integer,
        CONSTRAINT materials_pkey PRIMARY KEY (material_id)
    );

    CREATE TABLE IF NOT EXISTS public.partner_products
    (
        sale_id serial NOT NULL,
        product_id integer NOT NULL,
        partner_id integer NOT NULL,
        quantity integer NOT NULL,
        sale_date timestamp without time zone NOT NULL,
        CONSTRAINT partner_products_pkey PRIMARY KEY (sale_id)
    );

    CREATE TABLE IF NOT EXISTS public.partners
    (
        partner_id serial NOT NULL,
        partner_type character varying(50) COLLATE pg_catalog."default" NOT
NULL,
        partner_name character varying(255) COLLATE pg_catalog."default" NOT
NULL,
        director character varying(255) COLLATE pg_catalog."default" NOT NULL,
        email character varying(255) COLLATE pg_catalog."default" NOT NULL,
        phone character varying(50) COLLATE pg_catalog."default" NOT NULL,
        address text COLLATE pg_catalog."default" NOT NULL,
        "INN" character varying(12) COLLATE pg_catalog."default" NOT NULL,
        rating integer,
        CONSTRAINT partners_pkey PRIMARY KEY (partner_id),
        CONSTRAINT partners_inn_key UNIQUE ("INN")
    );

    CREATE TABLE IF NOT EXISTS public.product_types
    (
        type_id serial NOT NULL,
        product_type character varying(255) COLLATE pg_catalog."default" NOT
NULL,
        coefficient numeric(4, 2) NOT NULL,
        CONSTRAINT product_types_pkey PRIMARY KEY (type_id)
    );

    CREATE TABLE IF NOT EXISTS public.products
    (
        product_id serial NOT NULL,
        product_type_id integer NOT NULL,
        product_name character varying(255) COLLATE pg_catalog."default" NOT
NULL,
        article character varying(50) COLLATE pg_catalog."default" NOT NULL,
        min_partner_price numeric(10, 2) NOT NULL,
```

```sql
        CONSTRAINT products_pkey PRIMARY KEY (product_id)
    );

    CREATE TABLE IF NOT EXISTS public.users
    (
        users_id serial NOT NULL,
        username character varying COLLATE pg_catalog."default",
        password character varying COLLATE pg_catalog."default",
        CONSTRAINT users_pkey PRIMARY KEY (users_id)
    );

    ALTER TABLE IF EXISTS public.materials
        ADD   CONSTRAINT   materials_material_type_id_fkey   FOREIGN   KEY
(material_type_id)
        REFERENCES public.material_types (type_id) MATCH SIMPLE
        ON UPDATE NO ACTION
        ON DELETE NO ACTION;


    ALTER TABLE IF EXISTS public.partner_products
        ADD   CONSTRAINT   partner_products_partner_id_fkey   FOREIGN   KEY
(partner_id)
        REFERENCES public.partners (partner_id) MATCH SIMPLE
        ON UPDATE NO ACTION
        ON DELETE NO ACTION;


    ALTER TABLE IF EXISTS public.partner_products
        ADD   CONSTRAINT   partner_products_product_id_fkey   FOREIGN   KEY
(product_id)
        REFERENCES public.products (product_id) MATCH SIMPLE
        ON UPDATE NO ACTION
        ON DELETE NO ACTION;


    ALTER TABLE IF EXISTS public.products
        ADD   CONSTRAINT   products_product_type_id_fkey   FOREIGN   KEY
(product_type_id)
        REFERENCES public.product_types (type_id) MATCH SIMPLE
        ON UPDATE NO ACTION
        ON DELETE NO ACTION;

END;
```

Рисунок 2 – Код создания БД