CHAPTER II

LITERATURE REVIEW

2.1. Cake

Cake is baked batter made from flour, sugar, salt, baking ingredients, shortening, milk, eggs, and certain additives aroma. Cake is food that rich of protein, carbohydrate, fat, calcium and phosphorus. Cakes are also contained vitamin A, vitamin B1 and vitamin C (Subagjo,2007).

According to Merriam Webster, Cake is a sweet baked food made from a dough or thick batter usually containing flour, sugar, eggs and raising agent such as baking powder.

Cakes in Indonesia are usually categorized based on the water content those are "kue basah" or moist cake and cookies. Moist cake is generally soft textured and can not last long or perishable, this happens because of the composition or the ingredients of moist cake such as flour, sugar, coconut milk or water, egg and salt, which are easy to stale. Cookies are usually textured bit harder, and more durable in comparison with the moist cake. Moreover, the way of cooking is also different, Moist cake usually cooked by steaming and baking while Pastries cookies by baking.

2.2. Cake Classifications

Cakes as a part of bakery product have different characterisric compared to another bakery product. Based on the definition, cake is included in baked confectionery products, It means that cake is a sweet food product which contains more sugar and made from four main ingredients, those are flour, sugar, eggs and butter (Syarbini,2014)

Cakes have wide classification, since it can be seen from various viewpoints such as based on batter cake and the way of cooking. Based on batter, cakes are classified into three types. They are pound cake, sponge cake and chiffon cake. Based on way of cooking, they are baked and steamed cakes.

2.2.1. Cake classification based on batter cake

- **Pound Cake**

Pound Cake is a cake which have solid texture and made from four main ingredients such as flour, eggs, sugar and butter with same composition. Generally, Pound Cake is cooked by baking using loaf pan and garnish with icing sugar. Banana Pound Cake becomes one of favorite Pound Cake in Indonesia.

- **Sponge Cake**

Sponge Cake is kind of cake which has light batter and foam as the characteristic. Sponge cake is made from three main ingredients such as eggs, flour, sugar and the addition of liquid.

- **Chiffon Cake**

Based on the use of ingredients, Chiffon Cake categorized as a unshortened cake (cake without fat). The characteristic of chiffon cake is the combinations of shortened cake and unshortened cake with the separate of mixing process.

2.2.2. Cake classification based on way of cooking

- **Baking**

Bake is a way of preparing food by the process of conduction, generally in a closed oven. The term baking means the use of heat in an oven to convert the batter into baked good. In the process of baking, starch content in the food is processed usually decreased that provides the food a brown color which gives it an attractive and appetizing look (Gabon,2014). The key to proper baking really comes down to the proper ratio between the oven temperature and the baking time which can be determined by the size or weight of the dish (Adams,2015).

- **Steaming**

    Danilo Alfaro (2015) stated that steaming is a moist-heat cooking technique that employs hot steam to conduct the heat to the food item. Once water is heated at 212 degrees Farrreinheit, it stops being water and turns into steam. Steaming allows to reach the higher temperature with liquids by steaming them. Steaming is common method due to its fast cooking times, high heat and moist heat cooking nature.

2.3. The Nutrient content of cake ingredients

In this section the writer will discribe about the nutrient content of main ingredients in cake such as egg, sugar, milk, butter.

- **Egg**

    The fungtions of eggs in cake cooking process are as a structure builder and also as a softener to improve the moistener of cake structure.

Table 1

Nutrient content of egg per 100 gr

Total Fat	11 g	16%
Cholesterol	373 mg	124%
Sodium	124 mg	5%
Pottassium	126 mg	3%
Total Carbohydrate	1.1 g	0%
Protein	13 g	26%

- **Sugar**

    Sugar is one of the important ingredient in cake cooking process because the function of sugar are as a sweetener and tenderizer.

Table 2

Nutrient content of sugar per 100 gr

Total Fat	0 g	0%
Cholesterol	0 mg	0%
Sodium	1 mg	0%
Pottassium	2 mg	3%
Total Carbohydrate	100 g	33%
Protein	0 g	0%

- **Milk**

  Milk as a nutritive value in cake ingredient, milk able to accelerate the leavening agent like baking powder or baking soda to produce CO_2 in cake cooking process.

Table 3

Nutrient content of milk per 100 gr

Total Fat	1 g	1%
Cholesterol	5 mg	1%
Sodium	44 mg	1%
Pottassium	150 mg	4%
Total Carbohydrate	5 g	1%
Protein	3.4 g	6%

- **Butter**

  Butter is a solid dairy product made by churning fresh or fermented cream or milk, to separate the butterfat from the buttermilk.

Table 4

Nutrient content of butter per 100 gr

Total Fat	81 g	124%
Cholesterol	215 mg	71%
Sodium	11 mg	0%

Pottassium	24 mg	0%
Total Carbohydrate	0.1 g	0%
Protein	0.9 g	1%

2.4. The Recipes

The writer adapted Maksuba cake recipe from Widhia Anugrah as a food blogger.

2.4.1. Maksuba

Maksuba cake is traditional cake from the city of Palembang which is made from flour, eggs, sugar, milk and butter as basic ingredients.The sweet taste become a trademark of this cake. This cake is almost the same as other layer cakes, only some ingredients are different. This cake is usually served on special days such as lebaran's day, Christmas day and Chinese New Year. Beside that, maksuba are commonly used as souvenirs by tourists who visit Palembang city, maksuba cake can be found in certain traditional markets such as Cinde market because not all places sell these cake.

- **Maksuba Recipe**

  The Ingredients :

  - 20 pcs eggs
  - 5 table spoons butter
  - A can of Milk
  - 750 gram Sugar

  Steps of cooking :

  - First, Whisk the eggs, butter, sugar and stir well.

- Second, Add a can of Milk and whisk until it becomes smooth
- Next, Prepare the baking pan (24cmx24cm), grease a little butter and sprinkle with flour and cover it with baking paper.
- Last, Bake the cake layer by layer until the end of the process.

2.5. Sensory Perceptions

- **Texture**

Texture refers to those qualities of a food that can be felt with the fingers, tongue, palate, or teeth. Texture also is an index of quality. The texture of a food can change as it is stored, for various reasons. Evaluation of texture involves measuring the response of a food when it is subjected to forces such as cutting, shearing, chewing, compressing, or stretching. Food texture depends on the rheological properties of the food. Subjective measurement of texture gives an indirect evaluation of the rheollogical properties of a food (Vaclavic, 2008).

- **Aroma**

The aroma of cake usually comes from the mixing of vanili extrack in the cake batter. The function of vanili extrack is to make the cakes are aroma more fragrant. Besides the aroma of cake also comes from the ingredients itself. The choices of butter also can be good aroma for cake.

- **Color**

Color is the perception in the brain that result from the detection of light after it has interacted with an object(Lawless,1999).

- **Appearance**

The appearance of a food includes its size, shape, color, structure, transparency or turbidity, dullness or gloss, and degree of wholeness or damage. When selecting a food

and judging its quality, a consumer takes these factors into account, as they are indeed an index of quality (Vaclavic, 2008).