Recipe Mapping

— HOW TO TURN GOOD RECIPES INTO GREAT MENU ITEMS

good recipe for home cooking doesn't always work out when you attempt to replicate it in the restaurant. Startup restaurateurs find out quickly that a recipe intended to yield four, six or even 10 servings might not be practical when feeding dozens or even hundreds of guests — every day.

We've said it once, we'll say it again: Success in the restaurant business is often measured in pennies. Toss in an inaccurate purchase order here, a dash of wasted product there, and mix in a bit of inefficient labor use, and you've got a recipe for slim margins. And while your friends and family never minded waiting an extra half-hour or so for your famous meatballs, your restaurant guests will not be so forgiving to slow service and inconsistency.

For good recipes to become great menu items, you must learn to make them pleasing to both your guests and your accountant. You must break them down into stages that assist purchasing and inventory control, organize prepping, reduce production time, and maximize yield. Then you must build them up to serve dozens of covers.

We call it RecipeMapping — a three-step process that allows you to add new items to the menu consistently, methodically and profitably. We hope it helps "map out" your strategy for adding items to your menu, as well as help you put your startup "on the map."

Step 1 – Add Ingredients to the Master Inventory List.

Every restaurant should maintain a Master Inventory List that includes all of the ingredients that a restaurant must use in the preparation of their menu items. This list can be maintained using a spreadsheet format that includes purchasing information such as the pack, size and price of the ingredients — information that is useful when creating other management forms such as inventory and order forms. But to accurately calculate the real cost to produce a menu item, the Master Inventory list should not only reflect the purchasing cost and unit of measure, but also the corresponding recipe cost and unit of measure. Any ingredient used in cooking can be expressed in one of three units of measure when using it in a recipe — weight measure (typically ounces or lbs.), volume measure (such as tsp., tbsp., cups, qts. or gal.), or by piece. Many products are purchased by weight units of measure but are measured for recipes in terms of volume (fluid) measure. To determine a true recipe unit cost, it can require measuring a pound of product to determine its recipe yield. We provide Recipe Conversion Notes to assist in this process.

Step 2 – Create the Prep Stages. Here we identify parts of the menu item that can be prepared prior to final cooking and presentation, to reduce the time from order to service. Even a simple, single menu item often requires several subrecipes that are produced in batch and become part of the routine preparation tasks. Each subrecipe is then added to the Recipe Manual for reference by the kitchen staff. The cost of each subrecipe ingredient is calculated by multiplying the number of recipe units used by the recipe unit cost listed in the Master Inventory. The subrecipe batch is then assigned its own recipe unit and cost based on total cost to produce the batch and how much it yields.

Step 3 – Calculate Menu Item Cost. Finally, the cost of the menu item is determined by calculating the cost of each individual recipe or ingredient needed to produce the menu item, then affixing a selling price that produces the desired profit. Restaurants should review their menu item cost every three to six months to ensure that cost expectations are accurate.

This Month's Features: Pan-Grilled Shrimp Pasta and Gulf Coast Crab Cakes

This month's feature menu items are the creation of consulting chef Glenn "Captain" Cates. In his role as a menu consultant for A'la Carte Consulting Group, Captain Cates assists restaurant operators in establishing recipe manuals, including the proper costing and preparation procedures necessary for a profitable menu.





Line Cook Instructions

- 1. Melt 2 Tbsn. of butter over high heat in sauté pan; add shrimp, green onions, garlic, pasta seasoning and sliced mushrooms. Toss ingredients by shaking pan back and forth periodically. Meanwhile, place precooked pasta in hot water until heated; drain.
- 2. Continue sautéing until shrimp are just turning pink; do not overcook.

Pan-Grilled Shrimp Pasta

- 4 Tbsn. Butter (in all)
- 4 oz. wt. Shrimp
- 1/2 cup Green onions
- 1 tsp. Chopped garlic
- 11/2 tsp. Pasta seasoning
- 3 oz. wt. Sliced mushrooms (1/8" thick)
- 2 Tbsn. Lobster stock
- 2 Tbsn. Chopped parsley
- 8 oz. wt. Angel hair pasta (precooked al dente)
- 1 Tbsn. Fresh-grated parmesan
- 3. Add remaining 2 Tbsn. of butter, lobster stock and chopped parsley; toss by shaking pan back and forth.
- 4. Add heated pasta and toss well; blend all ingredients.
- 5. Pour into pasta bowl and mound slightly in center, making sure the shrimp are visible.
- 6. Sprinkle with parmesan cheese and chopped parsley.



Gulf Coast Crab Cakes

- 2 Each Crab cakes
- 2 oz. Tartar sauce
- 1 Each Lemon garnish
- 1 Tbsn. Butter
- 1 tsp. Chopped parsley

Line Cook Instructions

- 1. Melt butter on medium heat griddle or skillet.
- 2. Once butter is melted, add crab cakes.
- 3. Cook until golden brown on one side and then flip.
- 4. Continue cooking until the other side is golden brown.
- 5. Serve immediately with tartar sauce and fresh lemon garnish.
- 6. Sprinkle chopped parsley for garnish.



Step | Inventory Master

*Pan-Grilled Shrimp Pasta ** Gulf Coast Crab Cakes *** Used for Both Items

		Purchas	e Unit (PU)	Recipe Cost Unit (RU			(RU)
	Case		Current		# RU		
Item Description	Pack/ Size	U/M	Price	U/M	per PU	Yield %	Cost
* Shrimp 36-40 ct. P&D	4/2.5 lb. box	Case	43.00	OZ-wt	160	100%	0.269
* Mushrooms - fresh (med.)	1/10 lb. box	Case	18.85	OZ-wt	160	100%	0.118
* Chopped garlic (in oil)	12/32 oz. jar	Case	35.75	OZ-fl	384	100%	0.093
* Lobster base (no MSG)	6/1 lb. jar	Case	35.75	OZ-fl	77	100%	0.464
** Butter	30/1 lb.	Case	49.40	OZ-fl	480	100%	0.103
Parsley bunch - fresh	Bunch	Each	0.50	OZ-fl	21	53%	0.045
* Cappellini (Angel hair pasta)	20 lb. box	Вох	16.35	OZ-wt	320	200%	0.026
* Parmesan - fresh (grated)	2/5 lb.	Case	39.65	OZ-fl	426	100%	0.093
** Back fin lump crabmeat	1 lb. pack	LB	14.00	OZ-wt	16	100%	0.875
* Lemons - fresh (medium)	75 ct. box	Case	36.30	EA	75	100%	0.484
** Salt - granulated	24/26 oz. rds.	Case	17.20	OZ-fl	499	100%	0.034
* Cayenne pepper	14 oz. btl.	Bottle	7.20	OZ-fl	37	100%	0.195
** White pepper	20 oz. btl.	Bottle	7.20	OZ-fl	35	100%	0.206
** Black pepper	18 oz. btl.	Bottle	7.20	OZ-fl	38	100%	0.189
* Basil leaves (dried)	5 oz. btl.	Bottle	7.20	OZ-fl	28	100%	0.257
* Thyme leaves (dried)	6 oz. btl.	Bottle	7.20	OZ-fl	30	100%	0.240
* Oregano leaves (dried)	5 oz. btl.	Bottle	6.57	OZ-fl	25	100%	0.263
* Green onions	24 ct.	Carton	11.90	OZ-fl	336	82%	0.043
* Baking powder	6/5 lb. tin	Case	60.40	OZ-fl	556	100%	0.109
* Mayonnaise	4/1 gal.	Case	20.40	OZ-fl	512	100%	0.040
* Bread crumbs	12/24 oz.	Case	31.40	OZ-fl	658	100%	0.048
* Flour - self-rising	2/25 lb. sack	Bag	18.45	OZ-fl	1488	100%	0.012
Eggs (large)	1/15 dz. case	Case	24.15	EA	180	100%	0.134
** Milk	6/.5 gal.	Case	9.20	OZ-fl	384	100%	0.024
** Sour cream	3# tub	Carton	4.79	OZ-fl	48	100%	0.100
* Dijon mustard	2/1 gal.	Case	14.60	OZ-fl	256	100%	0.057
Dill relish	4/1 gal.	Case	16.20	OZ-fl	512	100%	0.032
* Dill weed - fresh	Bunch	Each	1.49	OZ-fl	21	44%	0.161
* Tarragon leaves (dried)	5 oz. btl.	Bottle	7.20	OZ-fl	33	100%	0.218
* Shallots	3# bag	Bag	5.49	OZ-fl	76	90%	0.080
* Hot sauce	12/12 oz. btl.	Case	34.60	OZ-fl	144	100%	0.240

The first step is to identify each ingredient for all the subrecipes and then to get the purchasing unit pack, size and cost information from your foodservice distributor. Raw ingredients for these menu items were chosen based on availability from local distributors. Once you have the purchasing information, you're ready to calculate the number of recipe units there are in each purchase unit.

Recipe Conversion Notes

Many products are purchased by the weight units of measure but are measured for recipes in fluid measures such as teaspoons, tablespoons or cups. Precise conversion formulas are necessary to attain accurate costs. Here are some facts we noted when calculating the number of recipe units:

- ✓ 1 cup of lobster soup base weighs about 10 oz.
- ✓ 1 cup of butter weighs 8 oz. (1 oz. wt. = 1 fl. oz.)
- ✓ 1 bunch of parsley weighs about 3.4 oz. (1 cup of chopped weighs about 1.3 oz.)
- ✓ Dry pasta has a cooked yield of 2-3 times its dry weight. ✓ 1 cup of breadcrumbs weighs about 3.5 oz.
- ✓ 1 cup of grated parmesan weighs about 3 oz.
- ✓ 1 cup of salt weighs about 10 oz.
- ✓ 1 cup of cayenne weighs about 3 oz.
- ✓ 1 cup of white pepper weighs about 4.5 oz.
- ✓ 1 cup of black pepper weighs about 3.8 oz.
- ✓ 1 cup of basil weighs about 1.4 oz.
- ✓ 1 cup of thyme weighs about 1.6 oz.

- ✓ 1 cup of oregano weighs about 1.6 oz.
- ✓ 1 bunch of green onions weighs about 3.5 oz. (1 cup chopped weighs about 2 oz.)
- ✓ 1 cup of baking powder weighs about 6.9 oz.
- V 1 cup of baking powder weights about 0.9 02
- ✓ 1 cup of self-rising flour weighs about 4.3 oz.
- ✓ 1 cup of sour cream weighs about 8.5 oz.
 - (1 fl. oz. = 1.06 oz. wt.)
- ✓ 1 bunch of dill weed weighs about 4.5 oz. (1 cup of chopped dill weighs about 1.7 oz.)
- ✓ 1 cup of tarragon weighs about 1.2 oz.
- ✓ 1 cup of shallots weighs about 5 oz.



Step 2 The Prep Stage - Pan-Grilled Shrimp Pasta

Recipe Card	e <mark>cipe Card</mark> Pasta Seasoning Batch			Recipe Cost				
INGREDIENTS	MEASURE	PROCEDURE	RU	# of RU	RU Cost	(Cost	
Salt - granulated	1½ cups	Accurately measure all ingredients into a clean and dry	OZ-fl	12	0.034	\$	0.41	
Cayenne pepper	½ cup	mixing bowl.	OZ-fl	4	0.195	\$	0.78	
White pepper	½ cup	2. Transfer to food processor	OZ-fl	4	0.206	\$	0.82	
Black pepper	½ cup	and mix for 3 minutes.	OZ-fl	4	0.189	\$	0.76	
Basil leaves (dried)	1½ cups	Transfer to airtight storage container and cover.	OZ-fl	12	0.257	\$	3.09	
Thyme leaves (dried)	1½ cups	container and cover.	OZ-fl	12	0.240	\$	2.88	
Oregano leaves (dried)	1½ cups	NOTE: Always mix spices well before using in recipes because	OZ-fl	12	0.263	\$	3.15	
		heavier spices tend to sift their			-	\$	-	
	way to the bottom of the storage container.			-	\$	-		
					-	\$	-	
					-	\$	-	
					-	\$	-	
					-	\$	-	
					-	\$	-	
					-	\$	-	
					-	\$	-	
					-	\$	-	
					-	\$	-	
TOOLS/EQUIP.: Mixing b	oowl, measuring cups	s and spoons, food processor or blender			Total	\$	11.89	
STATION: Saute YIELD: 7½ cup:	s				RU # of RU		OZ-fl 60	
SHELF LIFE: 7 days					RU Cost		0.20	

Subrecipes are usually prepared ahead of time and can be components for one or several menu items.

Pasta Seasoning

Sometimes, menu items require several spices and herbs. A proven method for maintaining consistency is to prepare a batch of the seasoning blend ahead of time, enabling the line cook to reduce the number of measures needed during the final cooking stage.

Recipe Card	Lobster	Stock Batch		Re	cipe Cos	t	
NGREDIENTS	MEASURE	PROCEDURE	RU	# of RU	RU Cost		Cost
obster base (no MSG)	6 Tbsn.	1. Bring 1/2 gallon of water to	OZ-fl	3	0.464	\$	1.3
Vater	½ gallon	boil in an 8 qt. stockpot; remove from burner.	OZ-fl	64		\$	-
		Using a French whip, add lobster base; whip until completely diluted. Transfer to 4 qt. Cambro and cover. NOTE: Stir well before each use to ensure even distribution of flavor.				\$	-
					- 5	\$	
					-	\$	
						\$	
					-	\$	-
					-	\$	-
					2	\$	
					-	\$	-
					-	\$	
					12	\$	12
					-	\$	
					-	\$	
					22	\$	
					-	\$	
					- 2	\$	-
OOLS/EQUIP.: 8 gt. st	lockpot, wire whip, 4 q				12	\$	

YIELD:

SHELF LIFE:

1/2 gallon

Lobster Stock

of RU

A single menu item may have several "subrecipes," and a recipe card should be created for each step. Other subrecipes for this menu item, but not shown, include sliced mushroom preparation, pasta precooking and portioning, chopped green onions, and chopped parsley.





Step 2 The Prep Stage - Gulf Coast Crab Cakes

Recipe Card	Crab Cake Patties Batch					Recipe Cost				
INGREDIENTS	MEASURE	PROCEDURE	RU	# of RU	RU Cost		Cost			
Back fin lump crabmeat	5 lbs.	Carefully pick over crab meat and remove all shell fragments.	OZ-wt	80	0.875	\$	70.0			
Bread crumbs	5 cups	Combine bread crumbs and milk into mixing bowl and set aside.	OZ-fl	40		\$	1.9			
Milk	1½ cups + 2 Tbsn.	3. In separate mixing bowl, blend	OZ-fl	13	0.024	\$	0.3			
Mayonnaise	1¼ cups	mayonnaise, eggs, parsley, green onions, baking powder, salt and	OZ-fl	10	0.040	\$	0.4			
Eggs (large)	4 (slightly beaten)	white pepper until smooth. 4. Add bread crumb and milk	EA	4	0.134	\$	0.5			
Parsley bunch - fresh	1 cup (fine chopped)	mixture; blend well. 5. Gently fold in cleaned crab and	OZ-fl	8	0.045	\$	0.3			
Green onions	3/4 cup (fine chopped)	blend, being careful not to break up	OZ-fl	6	0.043	\$	0.2			
Baking powder	2½ tsp.	large pieces of crab. 6. Form crabmeat mixture into balls	OZ-fl	0.4	0.109	\$	0.0			
Salt - granulated	1 Tbsn.	(about 3 oz. wt. each) and place in a holding pan resting on an ice bed.	OZ-fl	0.5	0.034	\$	0.0			
White pepper	1½ tsp.	This is to maintain temperature during the breading process.	OZ-fl	0.25	0.206	\$	0.0			
Flour - self-rising	as needed	7. Bread each patty as follows: self- rising flour, egg wash, and then	OZ-fl	20	0.012	\$	0.25			
Bread crumbs	as needed	bread crumbs. Shake off excess bread crumbs. Form into 3-inch	OZ-fl	20	0.048	\$	0.9			
Eggwash	as needed	patties.	OZ-fl	20	0.060	\$	1.19			
		Place crab cakes on paper-lined sheet tray; cover and keep				\$	~			
		refrigerated. NOTE: Egg wash = 1 egg to 1				\$				
		Tbsn. of water. Whip with wire whip			-	\$	-			
		until smooth; keep cold.			-	\$				
					2	\$	-			
TOOLS/EQUIP.: Mixing	bowl, sheet pan, tray liners		_			_				
					Total	\$	76.28			
STATION: Prep co YIELD: 50 3-inc	ook ch patties		-		# of RU	_	50			
SHELF LIFE: 2 days	on paules		-		RU Cost	0	1.53			

Crab Cake Patties

By preparing the crab cake patties ahead of time, consistency and shortened order preparation time are preserved.

l	Recipe Card		
l	•	Tartar Sauce	Batch
	INGREDIENTS	MEASURE	PROCEDURE
l	Mayonnaise	3 gallons	Combine all ingredients into mixing bowl for commercial
l	Sour cream	1½ gallons	mixer.
l	Dijon mustard	½ cup	2. Using wire whip attachment,
l	Shallots	3 cups (fine chopped)	mix until fluffy and well-blended. Refrigerate.
l	Dill relish	3/4 cup	
l	Dill weed - fresh	3 cups (fine chopped)	
l	Parsley bunch - fresh	3 cups (fine chopped)	

Recipe Cost								
RU	# of RU	RU Cost		Cost				
OZ-fl	384	0.040	\$	15.30				
OZ-fl	192	0.100	\$	19.16				
OZ-fl	4	0.057	\$	0.23				
OZ-fl	24	0.080	\$	1.93				
OZ-fl	6	0.032	\$	0.19				
OZ-fl	24	0.161	\$	3.87				
OZ-fl	24	0.045	\$	1.08				
OZ-fl	1	0.218	\$	0.22				
OZ-fl	1	0.240	\$	0.24				
OZ-fl	2	0.034	\$	0.07				
OZ-fl	1	0.189	\$	0.19				
		-	\$	-				
		-	\$	-				
		-	\$	-				
		-	\$	-				
		-	\$	-				
		-	\$	-				
		-	\$	-				

Total \$ 42.47

RU OZ-fl # of RU 640

of RU 640 RU Cost \$ 0.07

Tartar Sauce

This version of the popular seafood condiment uses shallots rather than onions, giving the sauce the familiar onion taste without the strong onion aftertaste.



TOOLS/EQUIP.: Commercial mixer, mixing bowl, wire whip attachment.

4 Tbsn.

4 Tbsn.

8 Tbsn.

4 Tbsn.

STATION: Pantry
YIELD: 5 gallons
SHELF LIFE: 5 days

Tarragon leaves (dried)

Hot sauce

Salt - granulated

Black pepper



Step 3 Calculate Menu Item Cost

The final step for turning the recipe into a menu item is to add the cost of the ingredients needed to produce it. Calculating the cost of each individual recipe needed to produce the menu item makes it easy to cost out the finished menu item and affix a selling price that is profitable.

Menu Item: Pan-grilled Shrimp Pasta Item Description: Pan-grilled shrimp and mushrooms in seasoned butter sauce; tossed with angel hair pasta								
Recipe Unit	Quantity	Ingredient	Unit Cost	Extension				
OZ-fl	2	Butter	0.10	0.21				
OZ-wt	4	Shrimp 36-40 ct. P&D	0.27	1.08				
OZ-fl	2	Green onions	0.04	0.09				
OZ-fl	0.17	Chopped garlic (in oil)	0.09	0.02				
OZ-fl	0.25	Pasta Seasoning	0.20	0.05				
OZ-wt	3	Sliced mushrooms	0.12	0.35				
OZ-fl	1	Lobster Stock	0.02	0.02				
OZ-fl	1	Parsley bunch - fresh	0.04	0.04				
OZ-wt	8	Cappellini (Angel hair pasta)	0.03	0.20				
OZ-fl	0.5	Parmesan - fresh (grated)	0.09	0.05				
EA	1	Plate cost (Q-cost)	0.30	0.30				
		Total Cost	2.40					
		Menu Price	9.95					
			Gross Profit	7.55				
		Food Cost %	24.16%					

Menu Item: Gulf Coast Crab Cakes

Item Description: Classic lump crab meat blended with onions, spices and

breading

Recipe				
Unit	Quantity	Ingredient	Unit Cost	Extension
EA	2	Crab Cake Patties	1.53	3.05
OZ-fl	2	Tartar Sauce	0.07	0.13
EA	0.5	Lemons - fresh (medium)	0.48	0.24
OZ-fl	0.5	Butter	0.10	0.05
			0.00	0.00
			0.00	0.00
			0.00	0.00
			0.00	0.00
			0.00	0.00
			0.00	0.00
EA	1	Plate cost (Q-cost)	0.30	0.30
			Total Cost	3.78
			Menu Price	10.95
			Gross Profit	7.17
			Food Cost %	34.50%