RIA Toolkit
Performing Regulatory Impact Assessments (RIAs)
Lebanon Case Study

SUPPORT FOR LEBANON'S ACCESSION TO THE WORLD TRADE ORGANIZATION (WTO) PROJECT

BOOZ ALLEN HAMILTON

08/10/2012

This publication was produced for review by the United States Agency for International Development.

RIA Toolkit
Performing Regulatory Impact Assessments (RIAs)
Lebanon Case Study

USAID SUPPORT FOR LEBANON'S ACCESSION TO THE WORLD TRADE ORGANIZATION (WTO) PROJECT

CONTRACT NUMBER: EEM-I-00-07-00007-00 TASK ORDER #4

FROM BOOZ ALLEN HAMILTON

TO USAID LEBANON ECONOMIC GROWTH OFFICE

DATE: 08/10/2012

AUTHOR: BOOZ ALLEN HAMILTON AND LEBANESE ECONOMIC ASSOCIATION

Prepared for:

United Stated Agency for International Development (USAID)

Prepared by:

Booz Allen Hamilton, Inc.
Chris Crafton, Ph.D.
Mark Gerner
Zouha Sakr

Forward

Under USAID's "Support for Lebanon's Accession to the World Trade Organization (WTO) Project," Booz Allen Hamilton (hereinafter "Booz Allen") was requested by USAID to compile the results obtained during the project into a useful guide or "toolkit" for performing regulatory impact assessments or "RIAs" for use in other, future settings. The project had as one of its primary goals the development of methods by which both public and private sector representatives could evaluate regulations. Booz Allen used the outcomes of the project to develop this document, which includes "the Toolkit" as well as background information and practical examples.

There are notable features related to the project that informed the toolkit:

- The project focused on the country of Lebanon and while the background and case studies thus pertain to Lebanon, the toolkit methods are generalizable to any location;
- The toolkit includes two alternative approaches for performing impact assessments of regulations, a relatively simple and straightforward approach as well as a more sophisticated approach that considers the "time value of money;" both approaches are based on generally-accepted cost-benefit analysis methods;
- The toolkit does not describe in detail nor does it include discussion of the use of other assessment methods such as the use of econometric models, since this would be a significant undertaking requiring access to software, hardware and hands-on instruction, elements unlikely to be available to staff in the field (missions);
- The toolkit includes a critical stakeholder engagement element informing as to the importance of stakeholder identification and selection and also as to how the results of an RIA can be put into practice using stakeholder advocacy.

Contents

1. Introduction

Regulations perform an important role in society. Among their important purposes, they ensure that the society functions properly, that resources are not "squandered," and that laws are obeyed. Policy makers in government develop regulations with certain goals or intentions in mind: such as protecting community parks from vandalism or helping to ensure domestic producers can compete against imports. Problems can develop, however, when the *intended* consequences of a regulation do not result as "planned" and other, *unintended* consequences surface. Stakeholders who are disadvantaged by these "unintended" consequences may be motivated to work toward having the regulation reformed or eliminated.

A Regulatory Impact Analysis (RIA) Toolkit is presented here to help stakeholders – both public and private – in:

- Evaluating the costs associated with a particular regulation, either existing or proposed[1]
- Evaluating the expected benefits of the regulation
- Comparing the intended consequences (costs and benefits) with the actual consequences (costs and benefits).

This RIA Toolkit contains the step-by-step process USAID used in Lebanon for evaluating and advocating for or against a number of selected regulations. Based on what was learned as part of our analyses, we provide an overview of the main steps that anyone evaluating a regulation can follow. In addition to discussing the assessment of costs and benefits, we discuss two additional components of the Toolkit: the implementation piece and the evaluation piece. We provide detailed examples, conclusions, and recommendations of five RIAs performed in Lebanon by private sector participants using these steps, to illustrate both the progress made as well as the challenges and lessons learned in the process.

The next section of this document, Section 2, presents the RIA Toolkit as follows:

2.	The RIA Toolkit
2.1	More detail on the multiple purposes of RIAs and to answer the question: "Why perform an RIA?"
2.2	The main steps in performing an RIA
2.2.1	The diagnostic
2.2.2	The cost-benefit analysis
2.2.3	Stakeholder engagement and advocacy

The practitioner using the RIA Toolkit will be able to:

[1] In this Toolkit, the terms "regulation" and "regulatory change" are synonymous and used interchangeably. A "regulatory change" implies amending an existing regulation, introducing a new regulation or eliminating an existing one.

- Understand the relevance and importance of evaluating regulations
- Understand how to assess the expected impacts of any regulatory change by decomposing it into the relevant costs, benefits, and stakeholders
- Be equipped to advocate in favor of or in opposition to the regulatory change citing fact-based analysis obtained from the RIA.

2. The RIA Toolkit

A RIA is based upon classical cost-benefit analysis using location-specific information and detail as well as including implementation and evaluation components that involve stakeholder engagement.

2.1 Purposes of a RIA: "Why perform a RIA?"

A RIA is a policy tool for providing detailed information about the potential effects of regulatory measures – of both the intended and actual effects - in terms of costs and benefits to all parties affected by the regulation. The process used in performing a RIA facilitates careful consideration of the details that should be taken into account when designing, changing or implementing a regulation.

In its primary role, RIAs are conducted to provide interested stakeholders and decision-makers with factual, evidence-based, and detailed information about the costs and benefits pertaining to a range of feasible policy options relating to current, proposed or new regulations. The Mandelkern Group (2001) in a report for the EU described the RIA as an effective tool for modern, evidence-based policy making, providing a structured framework for handling policy or regulatory problems[2]. A RIA should be an integral part of the policy making process. It does not replace the political decision, but rather allows that decision to be made with clearer knowledge of the potential effects or impacts.

A paper by the OECD stated that "... [a] RIA's most important contribution to the quality of decisions is not the precision of the calculations used, but the action of analyzing – questioning, understanding real-world impacts, and exploring assumptions."[3] Such "improved understanding" was the outcome of each of the five in-depth RIAs completed as part of this USAID-funded project in Lebanon. As noted in Section 4 of this toolkit, each RIA resulted in a different level of rigor in terms of the quantitative inputs and outputs, an expected outcome given the many differences across the five RIAs due to data availability, stakeholder engagement, et. al. In the section that follows, we offer "best practices" in assessing and advocating for regulatory action

[2] Introductory Handbook for Undertaking Regulatory Impact Analysis (RIA).OECD.(2008), p3.

[3] Regulatory Policies in OECD Countries: From Interventionism to Regulatory Governance. OECD (2002), p 47.

derived directly from the experiences of each of the five Working Groups. We begin first with a diagnostic methodology to help determine the feasibility of performing a RIA.

2.2 The Main Steps in Performing an RIA

2.2.1 The Diagnostic: Determining Whether (or not) to Perform an RIA

While certain benefits apply to assessing any regulation as doing so informs of the expected net benefits, if one is looking to change a regulation or introduce a new one or eliminate an existing one, it is advisable to first determine to the extent possible *the likelihood of making the change* to the particular regulation. In other words, it may be fruitless to perform a RIA if conditions are such that no change to the regulation will be possible in the foreseeable future. Understanding *if* regulatory change is possible should be the first step toward undertaking a RIA.

In determining whether a regulatory change is possible and thus whether to proceed in performing a RIA, the following factors should be evaluated since they can facilitate successful regulatory change:

1. The degree of "ease" in working through the country's administrative process(es);
2. The amount of key stakeholder support for the action being proposed;
3. The strength of the factual support obtained by working through an RIA, i.e., the credibility of the cost-benefit analysis.

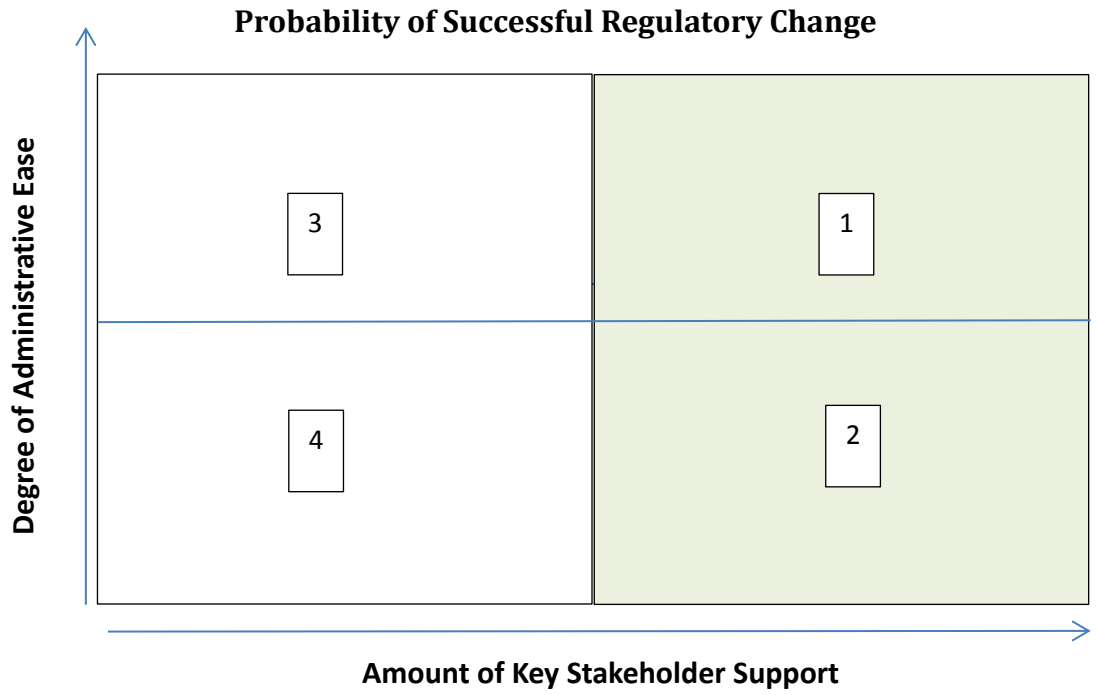
While all three factors are important, the first two should be considered *first* before considering the third factor because 1 and 2--particularly 2, the stakeholder support factor--will be a determinant of factor 3, i.e., understanding the stakeholder component is critical in working through the costs and benefits of an RIA.

The diagram below depicts the probability of successful regulatory change when viewed as a two-dimensional representation of factors 1 and 2: administrative ease and amount of key stakeholder support. When both factors are "high," i.e., when the current administrative process(es) facilitate(s) the regulatory change and when there is sufficient stakeholder engagement and support, the likelihood of effecting the regulatory change is highest. This would then support undertaking a RIA. The upper right quadrant, shown as quadrant 1, represents a "large presence" or "ample amount" of these two conditions. Where administrative ease is far less, i.e., where it is somewhat difficult to work through the administrative process(es) but where there may be considerable stakeholder support, the likelihood of success is lower but may be sufficient to effect the change being sought. This is shown as quadrant 2.

Where stakeholder support is very low or lacking, the likelihood of successful regulatory change is low - shown as quadrants 3 and 4. Quadrant 2 is a more "desirable" location than quadrant 3 even though quadrant 3 reflects greater administrative ease than quadrant 2 because ample

stakeholder support – reflected in quadrant 2 - is viewed as "more important" to determining successful regulatory change than is administrative ease. The reason for this is because administrative processes can themselves be changed if there is sufficient stakeholder engagement and support, yet the opposite is rarely true. No matter how easy it may be "administratively" to effect a regulatory change, if support is lacking then change will be unlikely. An extreme example is one zealot acting alone who wants to change a regulation because of potential personal benefit or gain.

How, then, does one determine if stakeholder support and administrative ease exist?



A Diagnostic Tool: Questions that Inform the Process

Working through a diagnostic exercise using a short set of questions can help determine if one has sufficient stakeholder support for the change being considered and if the administrative process is workable. For the stakeholder component, the following questions are pertinent and can be used as part of the diagnostic exercise:

1. Who are the main proponents of the regulatory change being considered, i.e., what are the groups or who are the individuals and what is their stake in the change, what will each gain or lose by the change?
2. What are the characteristics of each group/individual that are a measure of that group's or individual's political influence?

    a. How familiar is the group/individual with the change being proposed?
    b. How large is the group, how many members?
    c. Who is the most influential individual(s) in the group?
3. To what degree are the group's members in agreement regarding the proposed change?
4. How politically active has the group/individual been in the past and with what degree of success?
5. What key contacts do any members of the group have with the relevant public/government officials?
6. Are there any obstacles or deterrents that could lessen or discourage the group's involvement, e.g., are there certain "conditions" for their support or limits (constraints) to their support?

For the administrative ease component, the following questions are pertinent and round out the diagnostic exercise:

1. The "What:"
    a. What is the general process required for effecting the change to the regulation (or adding/removing a regulation)?
    b. What are the requirements for making changes? What documentation, meetings, hearings, etc. are required?
    c. What is the approximate length of time it would take to effect the change based on historical experience (changes in regulations made in the past)?
2. The "Who:"
    a. Who within the government has control over the process (who are the decision-makers)? What are their positions and titles? What are their main areas of responsibility? How long have they been in their positions? Were they elected or appointed?
    b. How accessible are these individuals to meetings, discussions, etc., and who has the most access?
    c. What private interest groups, if any, are most influential with the key decision-makers?
    d. On which side of the issue is the press/media likely to be, i.e., will the media support the change being considered?
3. The "How:" How transparent or open is the process, i.e., does the process allow participation by stakeholders and the public?

The table below provides sample answers to the above questions that may be used to determine whether a proposed regulatory change is likely to be successful. The questions are listed in column 1 of the table. In column 2, those answers that are *most conducive to supporting a regulatory change* are presented. If other answers are obtained that differ from the ones

illustrated in column 2 of the table, the proposed regulatory change may have a lower probability of being executed and it may then not be worthwhile to perform a RIA. This approach is a qualitative exercise that is not meant to be precise but rather to provide several insights for making the determination. The list of questions and desired answers can be augmented and customized to fit the specific geography.

Table 1: RIA Feasibility Diagnostic

RIA Feasibility Diagnostic	
Stakeholder Engagement	
Question	Characteristics Supporting a Successful Regulatory Change and Supporting the Conduct of an RIA
1. Who are the main proponents of the regulatory change being considered, i.e., what groups or individuals and for each group what is their stake in the change, what will each gain or lose by the change?	- A sizeable list of proponents - A high stake or stakes - A major gain or gains
2. What are the characteristics of each group/individual that are a measure of that group's political influence? a. How familiar is the group/individual with the change being proposed? b. How large is the group, how many members? c. Who is the most influential individual(s) in the group?	- More rather than less familiarity - Large rather than small group - Multiple significant, influential members
3. To what degree are the group's members in agreement regarding the proposed change?	- More agreement rather than less (more homogeneity among members)
4. How politically active has the group/individual been in the past and with what degree of success?	- More active politically *assuming successes in the past*
5. What key contacts do any members of the group have with the relevant public/government officials?	- Multiple, high level contacts
6. Are there any obstacles or deterrents that could lessen or discourage the group's involvement, e.g., are there	- No (or very few) obstacles or deterrents - No conditions or limits

certain "conditions" for their support or limits to their support?	
Administrative Ease/Difficulty	
1. The "What:" a. What is the general process required for effecting the change to the regulation (or adding/removing a regulation)? b. What are the requirements for making changes? What documentation, meetings, hearings, etc., are required? c. What is the approximate length of time it would take to effect the change based on historical experience (changes in regulations made in the past)?	- A relatively streamlined process involving minimal time and minimal commitment of resources (fees, etc.) - Few, limited requirements for making changes - Length of time is relatively short, measured in weeks or months rather than years
2. The "Who:" a. Who within the government has control over the process (who are the main decision-makers)? What are their positions and titles? What are their main areas of responsibility? How long have they been in their positions? Were they elected or appointed? b. How accessible are these individuals to meetings, discussions, etc.? c. What private interest groups, if any, are most influential with the key decision-makers? d. On which side of the issue is the press/media likely to be, i.e., will the media support the change being considered?	- Decision-makers have a reputation of fairness and action as well as openness (transparency) - Decision-makers are accessible, meaning that they are available for discussions, etc. - The most influential private interest groups align with or agree with the group proposing the regulatory change - Media support the regulatory change
3. The How:" How transparent or open is the process, i.e., does the process allow participation by stakeholders and the public	- Process allows for open participation by the public

Once each question has been answered for the regulatory change being considered and the answers compared to the answers in column 2 of the table, it should be clearer as to how successful the proposed regulatory change is likely to be, i.e., whether there is strong stakeholder support, whether the administrative process is workable, and, as a result, into which quadrant on the prior diagram the proposed action may fall. The closer the proposed change can come to quadrants 1 or 2, the better chance there will be for successful regulatory change and the more worthwhile will be the undertaking of an RIA.

For those proposed actions falling in quadrants 3 or 4, based on the information obtained through the diagnostic questions, a RIA may not be a worthwhile undertaking as it will be difficult to fully execute and complete, and even if executable, the likelihood of effecting the desired regulatory change with the completed RIA will be relatively low. If this is the outcome of the diagnostic exercise, a judgment call should be made as to whether or not to proceed in performing a RIA. As was the case with the Lebanon Working Groups, the level of quantitative rigor differed among the RIAs; however, in all instances the information obtained with the RIAs benefitted the Working Group participants. Such may be the case even if administrative ease and stakeholder support are lacking for the regulatory change at issue and may warrant moving forward with the analysis.

Section 3 of the Toolkit provides considerable detail on Stakeholder Engagement and Advocacy. While Section 3 follows Section 2 in the Toolkit, both activities can be performed concurrently. In fact, the detail on stakeholder identification and selection from Section 3 will be most useful in setting up the cost benefit analysis.

2.2.2 Cost Benefit Analysis (CBA)

As already noted, a RIA has its foundation in classical CBA. We use the term "classical" to connote that the usual advantages and challenges associated with performing a CBA also apply to performing one within the context of a RIA.

Ideally, a CBA follows a definitive process:

- Estimates the costs and benefits relating to the regulatory change incremental to a realistic baseline, and, where relevant, to other regulatory alternatives (i.e., where the "baseline" is the status quo or "do nothing scenario")
- Quantifies and values all costs and all benefits to the extent data is available
- Treats risk and uncertainty transparently and objectively, and adjusts the costs and benefits accordingly

- "Discounts" all future values (costs, benefits) to their Present Value[4]
- Compares the discounted costs to the discounted benefits.

In most real-world cases, particularly where quality data is lacking, executing the ideal CBA is not possible. Benefits in particular are often difficult to quantify. There are also non-monetized costs that are similarly difficult to quantify. There may be disagreement over the correct discount rate. Despite these challenges, it may be worthwhile to proceed with the CBA if *sufficient* data is available – every situation is different and should be assessed individually.

A CBA typically compares the costs and benefits associated with a regulatory change against some baseline or other alternative(s). The baseline often is the status quo. But many times there are multiple policy options that are being weighed and as such a CBA is performed for each of several regulatory options. Decision-makers then make a recommendation based on a comparison of the "net benefits" for each option. Thus, in performing a CBA we are measuring the "delta" or difference between or among two or more options, where one option may be the present state or baseline.

Before one can estimate the relevant costs and benefits of a regulatory action, one should answer the following questions:

1. Purpose of the regulatory change:
    a. What is the problem that needs to be "fixed?"
    b. Is the problem likely to change over time (become better or worse)?
    c. Is the problem sufficiently large to justify government action?
    d. Can the proposed regulation adequately address the problem?
    e. Can the government enforce the regulation?
    f. What alternatives exist to the proposed regulatory change?
2. Identification of stakeholders:
    a. What groups will be affected?
    b. What is the size and importance of each group, e.g., how much political influence does each group have?

It is best if one can write a clear statement of the objective or purpose of the regulatory change based on the answers to the above questions. If one has worked through the diagnostic exercise presented earlier, then many of the stakeholder questions have been answered.

Once we have a clear statement of the regulatory objective and the stakeholders identified, one can proceed with the CBA. This Toolkit includes two options for performing the CBA:

[4] Discounting to Present Value is discussed further on in the toolkit.

1. Completion of an *analytical template* that captures at a high level the needed cost/benefit information -- we refer to this template as the *Process-Model-Worksheet (PMW);*
2. Completion of a more detailed analysis that accounts for costs and benefits *over time* using discount factors and Net Present Value.

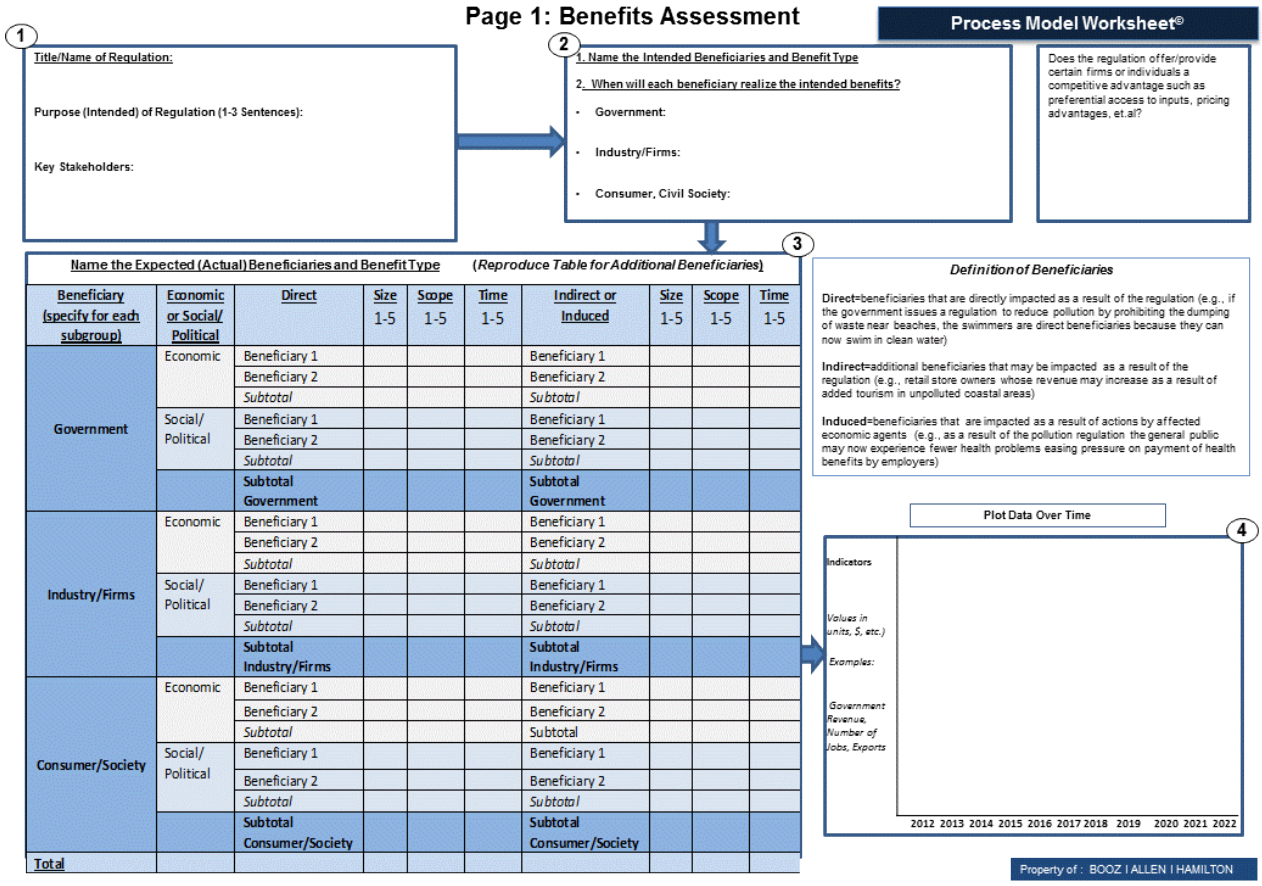
We start with the PMW and explain how to complete it. Even if a more detailed analysis is preferred, it may be helpful to begin with completing the template as an initial assessment.

The Process Model Worksheet (PMW)

Performing a CBA does not have to be difficult. The PMW presents a step-by-step method for completing a simple analysis. It has a logical flow, asks the key questions, facilitates collection of information, does not rely on quantitative analysis exclusively, and is less "data dependent" than other CBA methods. Figures 1 and 2 show a blank two-page PMW template. Note that the boxes are numbered sequentially and can be filled in with the requested information in that order.

The PMW consists of two pages: the benefits analysis is on one page and the cost analysis is on the second page. Box 1 asks you to name the regulation, specify its intended purpose and list key stakeholders. Box 2 asks you to specify the *intended* beneficiaries and state when each beneficiary is expected to realize the *intended* benefits. We make a purposeful distinction in using the adjective "intended." The *actual benefits* expected to result from the regulation may differ *significantly* from the *intended benefits*. For example, government policy makers may attempt to protect consumers from certain food-borne illnesses by setting a regulation that requires food processing plants to use specialized equipment. If certain food processing firms already use such equipment or have better, lower cost access to such equipment, these processors may benefit from the regulation as other processors who face higher costs of compliance with the regulation and are unable to compete may eventually exit the market entirely. The remaining food processors with the now larger market share would be an unintended but actual beneficiary of the regulation. This point will become clearer as the PMW is explained.

Figure 1: PMW Page 1 Benefits Assessment



In Box #3, we shift the focus to *actual* beneficiaries and ask you to identify them, breaking them out into different groups: government, industry, and consumer/society. Box 3 asks you to first decide if the beneficiary is a direct beneficiary or indirect/induced, using the definitions provided to the right of Box 3. Box 3 also asks you to rate on a scale of 1 to 5 the actual expected benefit of the proposed regulatory change to that beneficiary, with 1 representing the lowest expected benefit and 5 being the highest expected benefit. We then total the numbers in each column. Box 4 allows you to display the levels and trends of the actual expected benefits for each of the three groups of beneficiaries, using the information compiled from Box 3.

Page 2 of the PMW is similar to Page 1 but addresses the costs. This page requests information to be inserted in Box 5 on the intended cost bearer and cost type, i.e., direct, indirect and induced, using the definitions to the right of page. Box 5 also asks you to note the timeframe during which the cost bearer is expected to pay the costs of the regulation[5]. The box to the right of Box 5, which is not numbered, asks you to assess the ability of the cost-bearer to shift the

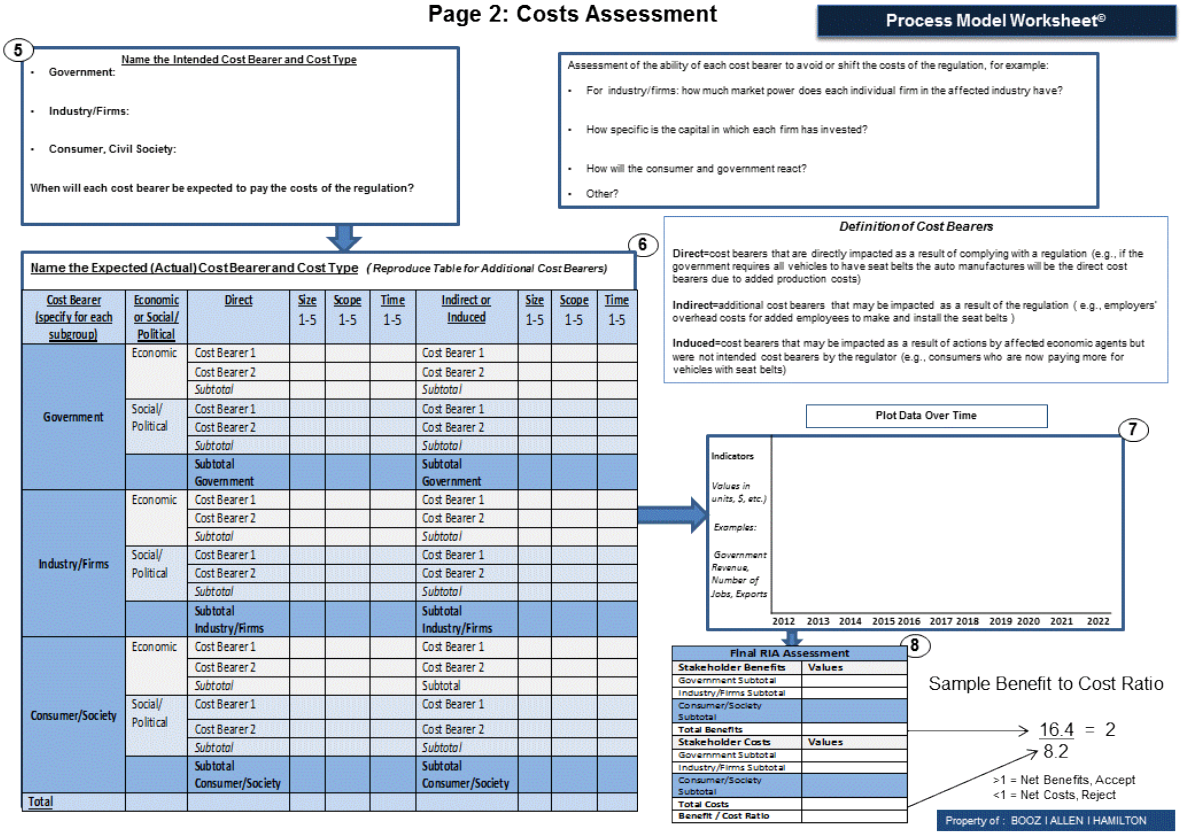
[5] As will become clearer in the discussion of the time value of money, the further into the future that costs can be deferred, the lower is the impact or size of the cost "burden" to stakeholders (ceteris paribus).

costs of the regulation to another party. This is part of the risk and uncertainty component of the CBA[6]. Box 6 is similar to Box 3 (on the Benefits page) but this time focuses on *actual* costs. In our example of a food processing regulation, an actual cost-bearer would be those food processing firms that are unable to compete with those firms that already have the required, new equipment in place. Box 7 allows you to display volume/size and trends over time.

Box 8 brings the benefit analysis and cost analysis together for a simple ratio comparison. Using the sums from Boxes 3 and 6, completion of Box 8 allows you to compare total benefits to total costs. The ratio can also be "flipped," to show the cost-to-benefit ratio. If the value of the cost-benefit ratio is greater than 1, it means that the expected benefits exceed the expected costs and that the regulatory change is expected to result in *net benefits*. If the cost-benefit ratio less than 1, it means the opposite: the costs exceed the benefits or the regulatory action can be expected to result in *net costs* if the regulatory change is adopted. This ratio comparison provides a rough estimate of the costs versus the benefits. We will see that the ratio method has limitations and if good quality data is available in sufficient amount to enable estimation of costs and benefits over time in some detail, then the more detailed CBA that will be discussed next may be preferred.

[6] Parties may be able to "shift" costs to others by escaping the intended cost impacts of the regulation. A typical example is an environmental protection regulation on industrial waste disposal to which a manufacturer responds by dumping waste into a nearby river. The costs associated with properly disposing of the waste are not borne by the manufacturer but the public unable to use the river for recreation, drinking water, etc.

Figure 2: PMW Page 2 Costs Assessment



Accounting for Time

In estimating both the expected costs and benefits we recognize that the period of time in which the cost or the benefit "happens" makes a difference in the "value" or size of that cost or benefit. Future costs – cost incurred at a later period – such as one year out into the future – cannot be directly compared to costs incurred today without adjusting for the impact of time. A $100 fee that I must pay a year from now may equate to only $95 today if I can invest $95 today in an interest bearing asset such that it earns an additional $5 by next year. A dollar earned today has a higher value than that same dollar earned next year. We refer to this as the "time value of money."

When we perform a cost benefit analysis of a regulation, we expect the impacts or effects of the regulatory change to last longer than the current period, that is, longer than the current year. We expect that the benefits of the regulatory change will span a number of years and the same for the costs, although it is frequently the case that the period length for benefits will differ from the length of the costs. As an example, it may cost a million dollars over the next five years to build a park but the benefits of the park will extend far longer into the future than five years.

To be able to compare the stream of benefits to the stream of costs we have to adjust future periods' benefits and costs to their value in the current period. We refer to this as" discounting to the Present Value the benefits and the costs." We are familiar with adjusting future values for inflation; discounting is similar but can account for more factors than solely inflation.

There is specific information one must have to begin the process of discounting to Present Value:

- Identify what costs and benefits occur in each period in the future – typically each year into the future; both amount (size) as well as the specific period are important;
- Select the appropriate discount rate by which to adjust future benefits and costs; typically we can obtain the appropriate discount rate from public sources.[7]

An example here may be useful in discussing the discount rate and how it is used in this analysis. If the discount rate selected is 10%, then the Present Value of $100 earned in benefits next year is equal to $90.91 today, using the following formula:

Present Value = Future Value / (1 + Discount Rate) or

? = $100 / (1 + 0.10)

$90.91 = $100 / (1 + 0.10)

The above formula becomes a bit more complex when we have a benefit or cost stream that extends into multiple future periods (years):

Present Value = (Future Value) x $[1/(1 + i)^n]$, where "n" represents the number of periods (years)

The good news is that there are published sources for value of the term on the far right of the equation so that one does not have to compute it. This term:

$[1/(1 + i)^n]$

is the *discount factor* referred to previously and can be obtained already computed from online sources such as the U.S. Federal Reserve. "n" is the number of periods. All one needs to know then are:

- an estimate of the future values of the benefits or costs for each period
- the number of periods
- the discount rate.

The next step then is putting together a table of the future costs or benefits such as shown below:

[7] Further discussion on identifying an appropriate discount rate is included on page 20

Table 2: Benefits

	Current Year (CY) Benefits	CY + 1	CY + 2	CY + 3	CY + 4	Total
Benefits						
aaa						
aaa						
Total Benefits in Future Value	**AAA**					**AAAA**
Apply Discount Factor	**X%**					
Total Benefits in Present Value	**BBB**					**PV of Benefits = BBBB**

Table 3: Costs Table

	Current Year (CY) Costs	CY + 1	CY + 2	CY + 3	CY + 4	Total
Costs						
xxx						
xxx						
Total Costs in Future Value	**XXX**					**XXXX**
Apply Discount Factor	**X%**					
Total Costs in Present Value	**YYY**					**Present Value of Costs = YYYY**

Table 2 shows the "periods" or in this case "years" across the top row of the table. "CY" indicates "Current Year" and the following year is CY + 1, etc. In this table there are a total of 5 periods: the Current Year plus 4 additional years. The first column of the table lists all of the expected benefits. These benefits may include refunds, rebates, revenue gains, etc. The expected future value of each benefit is estimated and placed in the table under the appropriate period or year in which the benefit is expected to be realized.

As discussed above, we have to adjust future periods' benefits and costs to their value in the current period. The OECD guide[8] outlines that the standard is for regulatory benefits to be discounted by two conceptual rationales used as the basis for selecting discount rates: opportunity cost of capital and the social time preference. The opportunity cost of capital rationale adjusts the benefits and costs to reflect their value at the rate consumers and savers would use in discounting future consumption benefits. As an example, in the U.S. the 7% rate is used as an estimate of the average before-tax rate of return to provide capital in the U.S. economy.[9] This will vary by country and depending on the regulation. The guide also notes that since the effects of regulation do not always reflect *an allocation of capital*, when a regulation impacts private consumption (e.g., through higher consumer prices for goods and services), the standard is to assume a 3% discount rate as the appropriate proxy for the social rate of time preference[10].[11]

Depending on the focus of the regulation, market risk, time horizon of the analysis, and the regional location, the discount rate chosen will likely fall between 3-7%. However, at the time of the RIA, the analyst is recommended to conduct a literature review for recently completed RIA's on similar topics to understand the discount rate they use and to identify how this would apply to their analysis. A safe fallback option is to assume a conservative 5% rate. Since the opportunity cost of capital is not always directly observable, rates of return for investments include assumptions for risk, expected rate of inflation and taxes that should not affect the social

[8] Regulatory Policies in OECD Countries: From Interventionism to Regulatory Governance. OECD (2002), p 47.
[9] "*Regulatory Impact Analysis: A Tool for Policy Coherence"*, OECD, 2009, p.85 - 90
[10] Time preference is the inclination of a consumer towards current consumption (expenditure) over future consumption, or vice versa. What may induce a consumer to delay consumption is called Rate of Time Preference amount of money (expressed as a proportion of the consumer's current income) that will compensate him or her for forgoing current consumption. This rate corresponds with the market interest rate and depends (among other factors) on the consumer's expectations of the future income. If the future income is expected to be higher than the consumer's current income, he or she will have a high rate of time preference; thus, the interest rate has to be high enough to induce savings instead of spending. Similarly, if the future income is expected to be less than the current income, a rational consumer will be inclined to save even if the interest rate is low, http://www.businessdictionary.com/definition/time-preference.html#ixzz28iPRziB1
[11] "*Regulatory Impact Analysis: A Tool for Policy Coherence"*, OECD, 2009, p.85 - 90

discount rate. Once these factors are subtracted the discount rate (in real terms) will generally exceed 5%.[12]

Once a discount rate is selected, the future values of the benefits are them multiplied by the discount factor and the new values are inserted into the row labeled: Total Benefits in Present Value. A similar process is used to populate Table 3 for the costs.

Once both tables are completed, the Present Values of all benefits are summed across all periods and similarly for the costs. It is then straightforward to look at the ratio of discounted benefits to discounted costs:

(i) Total PV Benefits / Total PV Costs = Total Net Benefit

Similarly the ratio can be "flipped" to look at Total Net Costs:

Total PV Costs / Total PV Benefits = Total Net Cost

When we subtract the Total PV of the Costs from the Total PV of the Benefits, we obtain the *Net Present Value (NPV*):

(ii) Total PV Benefits – Total PV Costs = Net Present Value (NPV)

When we are comparing multiple regulatory alternatives or options, it is useful to compute both (i) and (ii) above. This is because one's decision as to which regulatory alternative to support should be based on the result of *both* calculations. It is not unusual for one alternative to have a high Total Net Benefit relative to the other alternatives, i.e., a higher benefit per unit of cost, but show a lower NPV compared to the other alternatives, i.e., the difference between Total PV Costs and Total PV Benefits. The distinction between the two operations is: 1) expressing the benefits in a ratio (division) versus 2) expressing net benefits as a sum or difference.

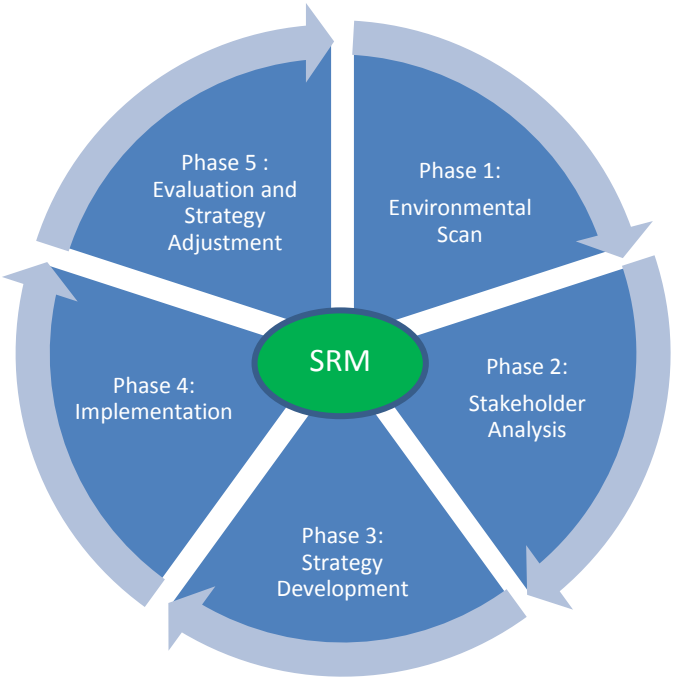
A comparison of benefits to costs or costs to benefits – for each alternative being considered – is a sound method for capturing the "gains" and "losses" associated with a regulatory change. If only one version of a regulatory change is being considered, the correct comparison is then only to "maintaining the status quo" or the "do nothing option." After the costs and benefits have been estimated, computed and compared, the next step is deciding how to use this information. The next section on stakeholder engagement and advocacy describes the importance and process for effective implementation planning.

2.2.3 Stakeholder Engagement and Advocacy

[12] Morrison, Edward R., "*Judicial Review of Discount Rates Used in Regulatory Cost-Benefit Analysis",* University of Chicago Law Review, http://www.law.columbia.edu/?exclusive=filemgr.download&id=8266, p. 1343

When aiming to either implement or change a regulation, negative or mismanaged stakeholder relationships can hinder a successful regulatory transformation. As policy and regulatory changes address increasingly complex issues and involve a number of internal and external stakeholders, developing effective stakeholder engagement and advocacy strategies is an essential aspect of the RIA process. By managing relationships with stakeholders, RIA practitioners and analysts can better understand their needs and concerns and develop approaches to proactively inform, involve, and inspire stakeholders, thereby transforming dispassionate audiences or even adversaries into partners in regulatory reform. One can accomplish these goals through a comprehensive stakeholder engagement framework we label as Stakeholder Relationship Management (SRM) and depicted in Figure 3.

Figure 3: SRM Framework



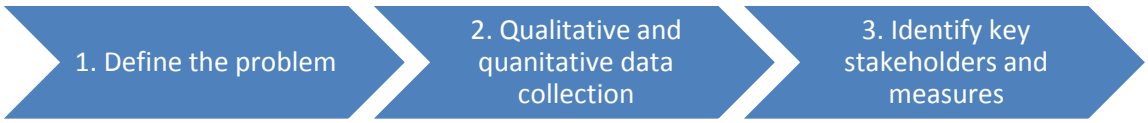
To better explain the SRM process, included below is a sample scenario designed to show how one would apply the SRM Framework to a specific case and to show illustrative steps for success.

Sample Scenario: A new "transparency regulation" is introduced to assist the pubic in better understanding the government contracting process.

Phase 1: Environmental Scan: Identification of Stakeholders

The SRM framework begins with an extensive Environmental Scan to identify how a specific regulation or policy change impacts specific stakeholders. The purpose of this activity is to identify the primary and secondary stakeholder groups associated with the proposed regulatory change. An environmental scan is decomposed into three phases:

Figure 4 Environmental Scan Methodology



Step 1: Define the problem

Before designing a methodology for collecting data on stakeholder groups in support of this environmental scan, the specific problems and questions being addressed by the proposed regulatory change are described.

Purpose: The purpose of defining the problem is to create a common understanding of the possible consequences of the regulatory change on stakeholders.

Process: One successful process for identifying the full range of problems that the proposed change is designed to address is through "brainstorming."

Desired Outcome: A clear delineation of all of the problems that the proposed regulatory change is expected to "fix."

Application to Sample Case: *Facilitated brainstorming sessions on how this regulation may impact different stakeholders are conducted. During these sessions, it is determined that the regulation's key challenge is gaining the participation of all government ministries in this proposed transparency initiative. The fear is that several ministries may not fully participate thus impacting the long term success of this proposed change.*

Step 2: Select Data Collection Method

Once the problems expected to be resolved are delineated, we review options for going about the process of collecting data on affected stakeholders.

Purpose: Ample data collection provides a holistic understanding of who the stakeholders are and their characteristics, how the proposed regulation or policy change is expected to impact each of them, and best methods for engagement. What method is selected for data collection is driven and determined by the characteristics of the stakeholder groups, ease of approach, willingness to share, abundance (or lack thereof) of published information, and other factors.

Process: The RIA practitioner should design a data collection strategy drawing from both qualitative and quantitative methods. The following table outlines several methods, each requiring a different level of human interaction. The analyst should aim to strike a balance between ease of collecting the information and thoroughness.

Table 4: Qualitative and Quantitative Data Collection Methodologies

	Description	What is involved?	Benefits	Disadvantages
Qualitative	Research into past policy changes in a specific country	Conducting interviews with stakeholders (formally and informally) who have implemented similar policy reforms in a specific country or region.	Learn from past lessons and apply them to current situation	May receive biased opinions or incorrect/incomplete information from stakeholders seeking to justify why they were not successful
	Secondary research from outside organizations assessing impact of policy and regulation changes	Conducting interviews with academics and other individuals associated with organizations that may have analyzed the policy or regulation change	Receive unbiased opinions from organizations that may be thinking differently about the change	Biased opinions based on the agenda of the source Analytic rigor may vary according to sources used
	Research into other countries' success with similar policy changes	Identifying countries that have implemented similar changes and conducting interviews with key officials to determine what worked and what did not work	Learn from others who have implemented similar reforms Gain valuable implementation advice	Requires investment in time and money for meeting-related travel
	Focus groups	Brings a spectrum of people together to discuss how the change may impact them	Opinion from a variety of stakeholders in one setting	Time consuming to conduct them correctly
Quantitative	Surveys (both online and in-person)	Designing questions to ask people about the policy or regulation change and administering them	Receive hard data about the opinions of the survey takers	Time consuming to design questions Difficult to get a representative sample to apply to larger level because of response rate
	Face to face	Designing questions to	Ability to gain in-	Time consuming to

	interviews with content analysis	ask to individuals and groups to gather information Conduct content analysis to identify similarities based on answers	depth knowledge on the specific questions through follow-on actions	schedule and conduct analysis

Desired Outcome: A data collection method that will result in sufficient data obtained on a timely basis that is relatively accurate.

Application to Sample Case: *During brainstorming it becomes apparent that both qualitative and quantitative data needs to be collected to gauge the attitudes of stakeholders about this proposed policy change. To maximize the impact of this effort it is decided that the team conduct 3-5 focus groups with key government contracting officers, a "lessons learned" trip that would visit neighboring countries that have implemented a similar regulation in the past three years, and survey of key academics and policy analysts.*

Step 3: Collect Data and Identify Key Stakeholders

Using the data collection method decided upon, data is collected to identify those key stakeholders who are expected to be most highly impacted by the proposed regulatory change.

Purpose: Identify the individuals and organizations expected to be most highly impacted by the proposed change. Identify the specific engagement strategy goals.

Process: Questions one may consider for identifying stakeholders include: How does one define the different groups, e.g., what distinguishes them from each other? Which individuals or groups are impacted most? Who has the most support for the proposed change? Who may be the most vocal in opposition to this proposed change?

Desired Outcome: Develop a list of stakeholders impacted by this change to be refined in Phase 2. This effort often uncovers stakeholders that are not directly associated with a regulation or policy change but may need to be included in future engagement or advocacy strategies because of influence or relation to key stakeholders.

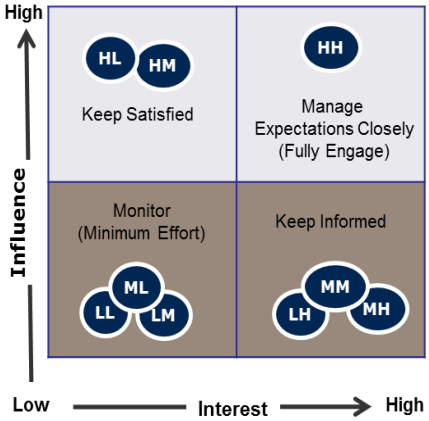
Application to Sample Case: *Based on the data collected, contracting officers and ministers will likely be the key stakeholders to effectively implement this regulation. However, data collection also identifies a number of public and private sector stakeholders with vested interest in this regulation. To support the regulatory change, the*

internal group identifies measures addressing both the awareness of the key stakeholders but also level or degree of support of the regulatory change. The group also determined that within six months of the implementation of the new regulation, 80 percent of all awarded contracts will be publicly available for review. This would support the larger goal of 100 percent within 18 months. These "goals" are part of a number of performance measures developed by this group to support the implementation of the policy.

Phase 2: Stakeholder Analysis:

During Phase 1 we created an extensive list of stakeholders to engage around this proposed regulatory change. Data collected during the environmental scan identifies "overlooked" stakeholders that were not considered prior to the environmental scan. [These stakeholders may include or be the same as those actual beneficiaries or cost bearers discussed above in the section on the PMW template.]

Figure 5 Sample Stakeholder Map



Step 1: Stakeholder Assessment

During the environmental scan phase, it is often the case that more stakeholders are identified than those who are recognized as essential in effecting successful regulatory change.

Purpose: The identified list of stakeholders developed from the environmental scan is often extensive creating problems in trying to engage these groups with limited budgets and resources. The stakeholder assessment step further analyzes, segments, and prioritizes stakeholders for the purpose of developing successful engagement strategies and maximizing limited resources.

Process: To maximize organizational resources, stakeholders are evaluated through a variety of lenses to determine which stakeholders are most influential for this regulatory change. These lenses may include the level of direct influence a stakeholder has on the proposed change, the level of interest in the proposed change due to the expected benefits to be obtained or the expected costs to be incurred, ability to influence other stakeholders, or ability to influence public opinion. Stakeholders may be assessed differently depending on which lens is used. As the engagement strategy is developed in Step 3, implemented in Step 4, and refined in step 5, this stakeholder assessment will be revisited and adjusted accordingly.

Desired Outcome: Develop a prioritized list of stakeholders with who to engage based upon the unique circumstances of the proposed regulation or policy change. Stakeholder maps, such as shown in Figure 5, can be used to visually display key stakeholders and ability to influence (change) their views and positions.

Application to Sample Case: *As a result of the data collected from the environmental scan, stakeholders for this proposed regulatory change include: the news media, the contracting officers, ministers, the transparency think-tank, World Bank, IMF, international aid organizations, several large business conglomerates, and the Prime Minister of the country. It is determined, after analyzing the data, that the contracting officers and ministers are highly influential regarding the proposed regulatory change. At the same time the media is passive in this effort and the large business conglomerates are against the proposed change.*

Step 2: Stakeholder Analysis Refinement

Ensure those stakeholders identified are the most appropriate with whom to engage for successful regulatory change.

Purpose: Prior to the development of an engagement strategy in Phase 3, this step provides a "check" by which to ensure that the key stakeholders identified can be expected to accomplish the goals of the regulatory change.

Process: The refinement of the stakeholder assessment conducted during this step allows one to maximize resources by involving the key stakeholders in this process early and making them part of the solution. Based on the results of the assessment conducted in Step 1, one should evaluate the stakeholder list and reach consensus as to who are the top stakeholders. In certain cases one may choose to focus on the most influential stakeholders to gain their support and buy-in, while in other situations one may focus specifically on marginalizing those stakeholder groups that are most set against the proposed change. During this process, it is important to note that those stakeholders with the most apparent "influence" over a regulatory change may be less "important" than those groups who are most committed to the change as this latter group will more easily join ranks to effect the change.

Desired Outcome: Drive consensus around the list of identified stakeholders for this regulatory change in preparation for the development of an engagement strategy in Phase 3.

Application to Sample Case: *As the stakeholders were assessed based on their level of support and influence, it was determined that the Prime Minister was supportive but not*

influential based on her prior statements in the press indicating that "the time was not right for a new transparency regulation." When compared to other key stakeholders identified, it was decided that the focus and attention should be directed on the contracting officers and ministers rather than on persuading the Prime Minister considering the time and resources it would require to change her mind on the issue.

Phase 3 Strategy Development

Once priority stakeholders have been identified and prioritized during the first two phases, the next step in the SRM Framework is developing a stakeholder engagement strategy.

Purpose: The Strategy Development Phase identifies the methods and techniques to be used to engage that stakeholder groups.

Process: This engagement strategy should describe the end result of engagement with individual stakeholders or stakeholder groups. The Engagement Strategy Matrix shown in Figure 6 helps to identify what the end result of this engagement will be and to assist in designing appropriate strategies. Certain stakeholders need to be involved in the very beginning of the process while others should be engaged after the policy is fully implemented. After stakeholders are mapped against a timeline, specific methods are discussed to determine the most effective strategy for engaging that particular stakeholder. As this timeline is developed, the entire strategy from start to finish will be evaluated to check for redundancies, gaps, discrepancies, and potential conflicts. Key points to consider as this plan is developed include:

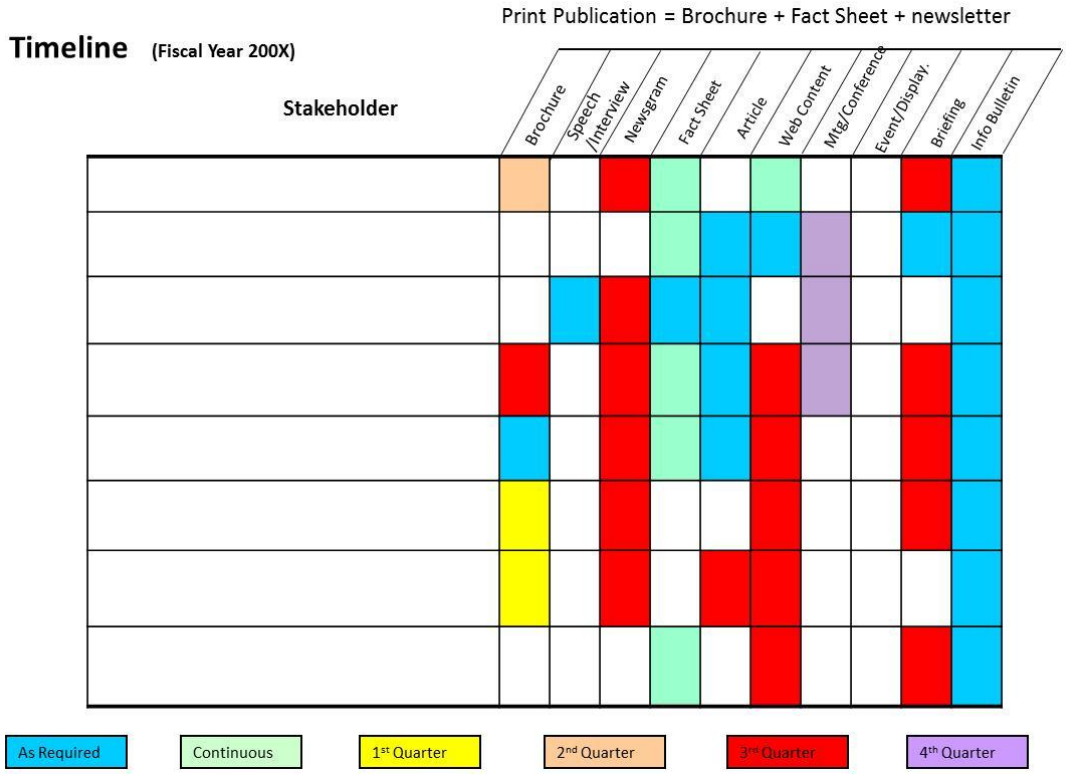
- Stakeholders have different motivations and react differently to proposed changes. These motivations need to be considered as the engagement plan is developed. For example, business stakeholders may view a proposed change from an economic lens of how it will better enable them to maximize profits. Meanwhile, academic stakeholders may approach the same proposed change from a lens of increasing the "public good" by creating more competition.
- Partnerships are important and one should look for common values between and among stakeholders to maximize the likelihood of success in changing the regulation. The strategy developed in this step should also take into account organizational history, the operating environment, and local culture as they could impact how certain stakeholders cooperate with or oppose one another.
- As part of the implementation engagement, it is important to design flexible strategies as events outside of one's direct control can impact full implementation. Preparing for these contingencies will help avoid partial implementation in the future.

Figure 6: Engagement Strategy Matrix

PROCESS	GLANCE	SCAN	READ	STUDY
WHAT:	Brief, general, colorful idea: The reader should be able to communicate the idea from a brief glance	More depth: Audience should be able to communicate the key messages after scanning	Those who read the message should be able to articulate message and understand the logic	Allows internalization of idea exchange and communication of the message
INTENT:	What is the point? **Get their attention**	Clearly articulate the story to … **Get the audience thinking**	Provide more detail **Get them involved**	Buy-in **Get them to take action**
PRODUCT:	One-page/ two-page brochure	Three-page brochure, story board sequence	Speeches, information papers, articles, transcripts	National strategy, policy, expanded study
EXAMPLE:	Posters	Television advertisement	Speeches, white papers, letter to editor	Policy paper

Desired Outcome: The engagement strategy should be tailored and sufficiently flexible to address any specific changes and new needs of organizations and stakeholders alike. This approach allows focus on the highest priority stakeholders while ensuring others are appropriately engaged. As a result of the analysis performed during this phase, an engagement timeline similar to Figure 7 can be developed.

Figure 7 Sample Engagement Timeline



Application to Sample Case: *Combining the data collected during the environmental scan with the stakeholder analysis, the result is a holistic strategy to engage stakeholders around this proposed regulatory change. In this case we have identified the contracting officers and ministers as the key stakeholders needed to achieve the goals outlined in Phase 1 of this plan because they will be required to adhere to new reporting standards as part of the new transparency regulation. While these stakeholders face the greatest degree of change from the "status quo," they can be expected to help institute a culture of transparency within government contracting throughout all sectors.*

This engagement strategy begins with meetings with all contracting officers in each ministry to discuss the new regulation and what it means to them. Meetings create a personal connection with all contracting officers and provide a venue for questions to be asked openly and answered. This will be time consuming, but recognizing the dramatic change in the prior process, it was determined this was an effective way to move all parties to a common understanding. At the same time, similar meetings will be held with ministers to inform them of the contracting officer meetings and their specific role in this change. While these meetings are taking place, a press statement will be released to communicate with the general public on the new regulation with respect to transparency. This press release will direct reporters and the general public to various websites that have additional resources around the policy change. The goal of this media outreach is to inform citizens and external stakeholders about how the country is addressing this issue. Follow-on meetings will be scheduled with both groups every six weeks to review data, share best practices, and adjust the strategy as needed.

After this strategy is developed, it needs to be approved for implementation. To accomplish this, it will be reviewed by all internal stakeholders for final edits. This helps develop consensus for the plan and will help with implementation.

Phase 4 Implementation

After the development of an engagement strategy in Phase 3, implementation of this plan should follow a systematic approach.

Purpose: During this phase, the strategy developed in Phase 3 will be implemented according to the plan that was developed and approved by the appropriate parties.

Process: Once approved, the strategy will be implemented according to the plan developed. Attention should focus on specific milestones and time frames to ensure the

strategy remains on schedule and appropriate stakeholders are engaged at the right moments.

Desired Outcome: The strategy is implemented accordingly to the plan developed and vetted in Phase 3.

Application to Sample Case: *After the engagement plan was approved, the focus of implementation was on developing partnerships between the two key stakeholder groups identified in Phase 2: the ministry officials and contracting officers. This partnership will help contracting officers understand the importance of this proposed change by providing awareness that the ministers are fully supportive and adhering to this policy. Based on the strategy developed, these meetings should take place within two weeks of the policy going into effect with follow-on meetings scheduled every two weeks to monitor implementation.*

At the same time, the strategy requires engagement of academic and media stakeholders to share information with the general public on the results of this policy implementation. The strategy calls on the development of key messages focusing on increased transparency to be communicated to these stakeholders with the objective of informing external stakeholders about transparency efforts. This engagement will not occur for approximately three months, to allow for data collection and follow-up with the contracting officers.

Phase 5 Evaluation and Strategy Adjustment

As the stakeholder engagement strategy is implemented, organizations need to independently evaluate the implementation against identified measures.

Purpose: This phase helps evaluate the implementation and possibly adjust the strategies based on data collected.

Process: To evaluate the implementation of this engagement strategy, qualitative and quantitative data should be collected from surveys, focus groups, and interviews to better understand how stakeholders view the implementation of this change. The data collected during this phase is compared to information collected during Phase 1 to better understand changes in stakeholder attitudes. After collecting and analyzing data, the organization can adjust the engagement plan accordingly to incorporate new tactics and engage new stakeholders as needed. For example, organizations may collect data on the levels of awareness of the proposed change, the percentage of full implementation of the new policy, and if they are communicating with other stakeholders. These indicators help

organizations understand if their strategy is succeeding and if any readjustments need to be made.

Based on the data collected, the organizations can edit the engagement strategy by going through the SRM framework phase-by-phase. This process will be less time consuming than the initial iteration but allows organizations to maintain continuity with the original plans. Key points to consider when evaluating an engagement strategy include:

- Stakeholders' attitudes may change throughout the implementation of the SRM framework. This may be due to a number of factors outside of the analysts' control but it is important to recognize the specific interests of each stakeholder group. This should be evaluated during this step and anticipated throughout the development and implementation of this engagement strategy.
- Thus, when developing the plan it is important to develop engagement strategies that are flexible and adaptable to support both short and long term success.

Desired Result: As a result of the evaluation phase of the SRM framework, the overall engagement strategy is modified to reflect changes in the operating environment and stakeholder attitudes. This process then becomes part of the framework and is conducted on a regular basis.

Application to Sample Case: *Six months after the stakeholder strategy for implementing this new transparency regulation was initiated, the stakeholder engagement strategy was evaluated against specific awareness and behavior measures. The organization conducted 3 focus groups with key stakeholders to assess the level of awareness of the transparency policy and to understand if the groups believed it to be beneficial to them. During these focus groups, a trend was identified indicating that this policy was better known and was seen as beneficial. However, within the general public it became clear that there was confusion on the paperwork required when responding to specific government contracts. As a result of gathering this information, edits to the engagement strategy were made to engage more with local print, broadcast, and digital media to design a campaign to share the needed information with the general public. A plan was devised to develop a survey to administer to the general public to assess the impact of this media engagement strategy, six months after implementation, to further evaluate its effectiveness at fostering a better understanding of the requirements.*

3. U.S. Assistance to Lebanon's WTO Accession Efforts: Background to the Five RIAs

The U.S. Government supported the Government of Lebanon's (GOL) World Trade Organization (WTO) accession efforts between 2000-2012 working closely with the Lebanese public sector. In the spring of 2011 USAID refocused the project towards a private-sector driven approach to promote enhanced trade facilitation and compliment past achievements with the public sector. By channeling the energy and natural incentives of a diverse set of private sector actors, USAID was able to implement activities to improve the legal and regulatory climate in Lebanon and advance WTO accession goals. Specifically, this included the introduction of the concept of RIAs to analyze regulations at the national level before and after they are enacted.

3.1 Background on Lebanon: Setting the Stage for the Five RIAs

For many areas of policy and regulation in Lebanon, the regulatory and legislative environment are often not well defined or articulated including international trade, agriculture, sanitary and phyto-sanitary measures, technical barriers to trade and investment, and certain intellectual property matters. Policies in these areas are asymmetrical and articulated through individual Ministerial or Council of Ministers Decisions and Decrees. These ad-hoc legal measures are frequently changed during the tenure of a government and as governments change. For example, new legislation often contradicts existing legislation without identifying which is valid, causing uncertainty among both the private sector and enforcing agencies. There is also an overlap in jurisdictions caused by legislation, especially in the area of food regulation.

One of the reasons for this is that procedures for enacting laws and regulations in Lebanon do not account for or require any impact studies or evaluation to be done prior to or after the enactment of key legislation. As a result, the regulatory regime in Lebanon lacks accountability and predictability.

As part of Lebanon's WTO accession process and to support Lebanon in these efforts, USAID worked with private and public sector partners to introduce the concept of regulatory impact analysis, helping to promote the development and implementation of a comprehensive and transparent policy process for rule making and subsequent economic development .

3.2 Selection of the regulations and Working Groups (members)

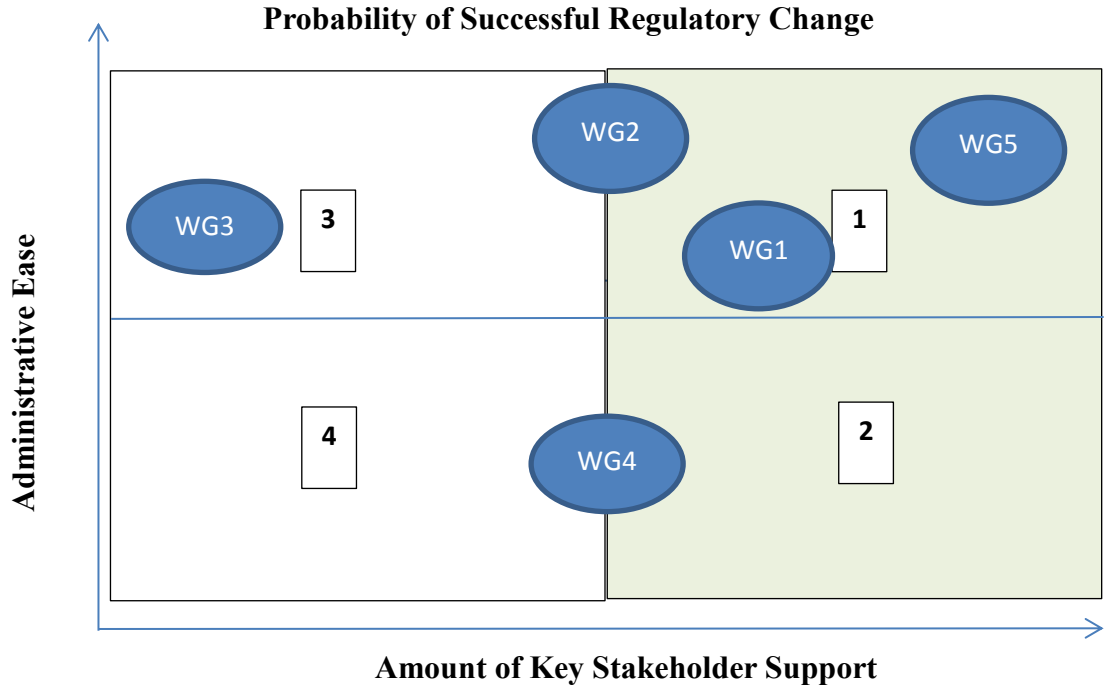
To introduce the RIA concept, USAID engaged with five public and private sector partners to provide support and guidance in the preparation of RIAs focusing on five important issues currently relevant to Lebanon.

The main criteria used in the selection of the five groups was the independence of each entity, their technical capabilities for conducting this task, and their ability to learn from this experience and take it forward beyond the scope and duration of U.S. assistance.

4. The Lebanon Project Working Groups: Applying the Three Step Process and Findings

Included in this section is a summary of the five RIAs outlined above. We provide detail on how each Working Group's RIA was assessed based on the diagnostic framework we discuss in section 2.2.1. We describe for each of the five regulations characteristics that positively or negatively impacted the likelihood of successful regulatory change (see figure 8). We conclude with a summary of challenges faced, conclusions, and outreach recommendations developed by each of the Working Groups, which represent the suggested steps to improve each Working Groups, stakeholders, and regulatory body's likelihood of achieving successful regulatory change going forward.

Figure 8: WG's 1-5 Probability of Successful Regulatory



4.1 WG1 – *RIA of Ministry of Agriculture and Ministry of Industry Decision no. 950/1 on Food and Beverage Producers and Other Stakeholders*

4.1.1 **Background**

In January 2011, the Ministry of Agriculture (MoA) and the Ministry of Industry (MoI) jointly issued regulation number 950/1 requiring food and beverage manufacturing establishments to register with the MoA, and subsequently be subjected to an inspection designed to ascertain compliance with health and technical standards. Decision number 950/1 addresses critical concerns related to food safety, consumer protection, and the environment. "Collateral" benefits of this regulation may pertain to easier access to export markets for Lebanese producers. The provisions of the regulation apply to processed food products destined for both local and export markets.

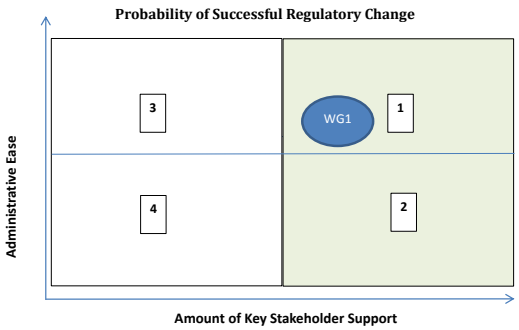
In conducting this RIA the Chamber of Commerce Industry and Agriculture for Beirut and Mount Lebanon (CCIAB) sought to weigh the costs and benefits to consumers, producers, government agencies, business support organizations, et. al., of a regulatory attempt to impose more stringent but internationally approved and adopted requirements to food safety and environmental protection on producers in the Food and Beverages (F&B) sector in Lebanon as a result of Decision no. 950/1.

4.1.2 **Diagnostic**

The F&B sector in Lebanon is the largest among manufacturing activities. From a private stakeholder perspective it has been increasingly challenging for Lebanese F&B exporters to access foreign markets as most countries are applying more stringent standards and specifications on their imports. The analysis therefore identified that by enforcing compliance with the more stringent internationally accepted health and safety standards, Decision no. 950/1 would be by the same stroke facilitating increased access of Lebanese F&B products to export markets.

Demonstrating their interest in this regulation, CCIAB funded a two - part survey. The main objective of this survey was three-pronged: to reach a meaningful estimate of the magnitude of compliance costs to manufacturers to identify manufacturers' expectations as to the potential benefits to be derived from compliance; and, to reveal their ability and intention to shift compliance costs onto consumers.

Figure 9: WG1 Probability of Successful Regulatory Change



The cost-benefit analysis applied in this RIA was based primarily on the results of this survey. However, due to a relatively high level of public and private sector stakeholder interest in this topic, the Working Group

also had the opportunity to draw from the following data sources to help inform the RIA and to promote stakeholder engagement throughout the RIA process.

- Lebanese Customs' statistical data on trade in the F&B sector
- Direct interviews[13] with Lebanon's ministry officials
- Direct field visits to F&B factories
- Working Group meetings and discussions with prominent F&B producers
- Ministers official statements

Given the level of stakeholder support and buy-in from public and private sector stakeholders, the Working Group was able to collect the necessary level of data to conduct a successful, rigorous, and credible econometric cost-benefit analysis, leading to factual support for regulatory implementation. Based on all of these factors, and as represented in Figure 9, WG 1 was projected to have a high probability of achieving successful regulatory change. Because this regulation is being heavily supported by the MoA, successful regulatory change has been defined by the Working Group members as "achieving the full benefit potential while limiting to the extent possible the anticipated costs to private industry stakeholders."

4.1.3 **Challenges**

Estimating benefits was more problematic than estimating costs due to the absence of data on key parameters. The Working Group based its estimates of the "business" component of benefits on projections of the food and beverages sector's increased production and exports. Due to a lack of publicly available and credible data sources, public health and environmental benefits were more difficult to assess.

There was also some concern from stakeholders with regard to the validity of Lebanese Custom's statistical data on trade in the F&B sector. This is a common concern in developing economies. The Working Group responded to these concerns by highlighting that this was Lebanon's sole official data set and, while not perfect, it aligned closely with national accounts data that is considered to be more reliable by stakeholders.

4.1.4 **Conclusion**

The RIA results indicated that the overall benefits from compliance with Decision no. 950/1 outweigh the costs by a margin of 16 percent. The RIA estimated that 12 percent of Lebanon's firms in the F&B sector (nearly 100 companies) will be forced to relocate their factories due to inadequate infrastructure. This finding was an important one for the Working Group because it

[13] The research team was unable to secure answers to questions addressed to the laboratory department of the Industrial Research Institute (IRI) despite numerous requests by e-mail and phone calls.

brought to light a heavy reliance on the country's physical infrastructure for the successful delivery of products by these sectors.

4.1.5 **Advocacy Recommendations**

To help alleviate some of the cost that will have to be incurred by private stakeholders as part of the relocation process, the Working Group proposed the following recommendations to the Lebanese government in order to achieve successful regulatory change:

- Increase coordination and inspector training among enforcing government bodies;
- Facilitate long-term specialized financing and tax exemption schemes to impacted producers;
- Relax stringent zoning conditions imposed on Food & Beverage factories;
- Rehabilitate and expand water supply and waste management infrastructure in industrial areas, and specifically in areas with high concentration of F&B manufacturers to render compliance less costly.

There was no commitment by the government to implement these recommendations and as such it remains to be seen if they will come to fruition. The RIA process did make clear, however, the challenges faced by this sector and the steps the government will have to undertake in order to ensure the implementation of this regulation will not cause significant disruption in domestic production.

4.2WG2: RIA of LIBNOR's Proposed Changes to Imported Honey Standards

4.2.1 **Background**

The Lebanese Standard Institution, LIBNOR, is a public institution under the Ministry of Industry. It was established in 1962 and has the sole authority to issue, publish and amend Lebanese standards in several sectors including agro-food. LIBNOR has also been designated by Lebanon as the Technical Barriers Enquiry Point for all inquiries from WTO Member States and other interested parties.

Currently, LIBNOR is implementing a set of standards on the essential composition and quality factors of honey sold in the domestic Lebanese market. These standards discriminate between locally produced and imported honey as to the maximum HMF (hydroxymethylfurfural) content allowed and are not fully compliant with the international honey standards of the Codex Alimentarius.[14] At present, importation of honey into Lebanon is subject to a maximum of 20mg/kg in HMF content. This compares to domestic producers' less restrictive requirement of 40 mg/kg maximum in HMF content. By limiting the HMF content of imported honey to a lower

[14] The Codex Alimentarius is a United Nations Food and Agriculture Organization (FAO) standard and aims, through a set of published standards, to ensure the safety of traded food products, and to facilitate trade.

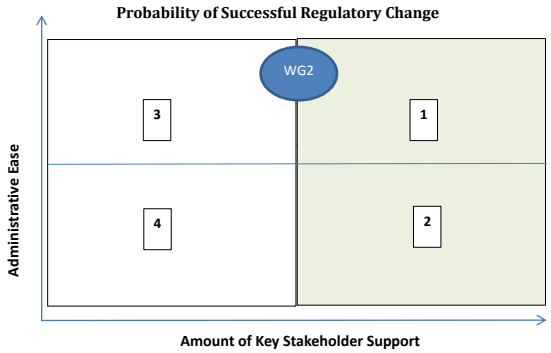
level than that of the Codex standards, Lebanon is imposing a barrier to trade on imported honey. Since Lebanon is bound by the Codex standard and is applying for accession to the WTO, LIBNOR is proposing to amend the current honey regulation to comply with the Codex standard and therefore raise the maximum acceptable HMF level for imported products.

LIBNOR requested this RIA to assess the benefits and costs of altering the standards on the composition and quality factors of honey sold in the domestic market, and to inform a stakeholder outreach and advocacy plan to gain private sector support from regional honey producers on this amendment.

4.2.2 **Diagnostic**

While LIBNOR is a government institution implementing these regulations, the Working Group had difficulties collecting credible and relevant data from their public sector counterparts. In many instances, while data existed in government agency datasets, this data was not "released" to LIBNOR and the Working Group for this analysis. Moreover, there was insufficient stakeholder buy-in to secure the data. As a result, the majority of the assumptions and analysis identified as part of this RIA was collected orally at three meetings with fifteen Working Group participants, calling into question the accuracy of the data provided.

Figure 10: WG 2 Probability of Successful Regulatory Change



It should also be noted that while LIBNOR is committed to move forward with implementing these new standards, for this regulatory change to be deemed successful LIBNOR understands that they will need to gain private sector support. Honey producers of all sizes expressed their concern that their production capacities were too small to successfully compete with much larger international competitors no matter how the regulation is worded. As a result, to this point LIBNOR has faced challenges to reach the key private sector stakeholders on the potential benefits of this regulation and as shown in Figure 10 this RIA is not projected to result in successful regulatory change in the short term.

4.2.3 **Challenges**

Although the Working Group emphasized the importance of quantifying the costs and benefits so as to effectively make their case, this proved difficult due to the lack of information and data on the current state of the domestic honey market, consumption habits, and relevant, regional economic indicators. It was therefore decided that the RIA should include a high level CBA

using the PMW process outlined in section 2.2.2 of this toolkit. To inform several of the assumptions and analysis of the PMW, the Working Group performed a literature review focusing on the impacts of deregulation of agricultural and similar specialty products industries in other comparable economies.

4.2.4 **Conclusion**

The high level CBA performed by the Working Group demonstrated an overall "net benefit" to Lebanon from the proposed changes to the HMF content requirement in imported honey. Most stakeholders were expected to benefit from the introduction of the new standard (consumers, government, import companies and retailers), while beekeepers were expected to be the only "net cost bearers." In the short-term, Lebanese producers were expected to operate at a competitive disadvantage because their honey production facilities are much smaller relative to their international competitors. However, this can be reversed in the long term if local businesses are able to increase their marketing efforts to generate more awareness of the quality of Lebanese honey, increase overall production levels to reduce their unit costs of production, and prepare for potential exporting opportunities abroad.

Included below (Figures 11, 12, 13) is the completed PMW that the Working Group created as part of their assessment process.

Figure 11: WG 3 PMW Benefits Assessment

Direct Benificiaries	Benefit	Scale 1-4	Time (S/L)
Cosumers	Lower Prices	2	S
Indirect Beneficiaries	**Benefit**	**Scale 1-4**	**Time (S/L)**
Government	Compliance with international trade rules	2	L
Import Companies	More sales	1	S
Retailers	Increase in Sales	0.5	S
Induced Beneficiaries	**Benefit**	**Scale 1-4**	**Time (S/L)**
Government	More employment	1	L
Import Companies	More employment	0.5	L
Retailers	Increase in general sales	0.25	L

Total Benefits	Total Benefit Short Term	Total Benefit Long Term
Consumers	+2	0
Government	0	+3
Import Companies	+1	+0.5
Retailers	+0.5	+0.25

Figure 12: WG 3 PMW Costs Assessment

Direct Cost Bearers	Cost	Scale 1-4	Time (S/L)
Small Bee Keepers	Less sales / exiting the market	-4	S
Large Honey Producers	Less sales	-2	S
Indirect Cost Bearers	**Cost**	**Scale 1-4**	**Time (S/L)**
Consumers	Less local honey	-1	L
Government	Employment Reduction	-1	S
Honey Intemediaries and Retailers	Less sales / less profit	-1.5	S

Total Cost	Total Cost Short Term	Total Cost Long Term
Consumers	0	-1
Government	-1	0
Small Bee Keepers	-4	0
Large Honey Producers	-2	0
Honey Intemediaries an	-1.5	0

Figure 13: WG 3 Net Cost/Benefit Assessment

Stakeholders	Net Cost / Benefit Short term	Net Cost / Benefit Long term
Consumers	2	-1
Government	-1	3
Small Beekeepers	-4	0
Large Honey Producers	-2	0
Retailers	0.5	0.25
Import Companies	1	0.5
Honey Packagers and Re	-1.5	0
Net Cost / Benefit	-5	2.75
Cost / Benefit Ratio	0.4	3.75

It should also be noted that in spite of the challenges this working group uncovered in their analysis, they managed to leverage the PMW methodology to prepare a very successful and high level assessment with tangible results. This Working Group is a great example of why the PMW approach can be a very successful strategy for introducing the RIA methodology to other sectors and regulations in Lebanon.

4.2.5 **Advocacy Recommendations**

Based on the positive results of the analysis, the Working Group recommended that LIBNOR engage with "large" local honey producers that are able to produce in larger quantities and then through the realization of economies of scale are better able to withstand the temporary

downward pressure on the current price level for honey expected from increased global competition. From LIBNOR these larger producers will need support and access to special labeling facilities and increased marketing to develop awareness of the quality of Lebanese honey before the new standards are implemented. Such assistance can be provided by the Food and Safety Testing Laboratories and Testing Laboratories in the Tripoli, Zahle and Saida Chambers of commerce. LIBNOR is also recommended to work with other government agencies to collect data that could inform a more detailed cost-benefit analysis of this regulation in the future. If additional data becomes available, LIBNOR could reconvene a second Working Group to augment the current RIA with a more complete and detailed cost-benefit analysis that could potentially be used to secure additional private sector buy-in for these regulatory changes.

4.3 WG3: RIA of Decision no. 720/1 "Import Conditions of Manufactured and Prepared Animal Products"

4.3.1 **Background**

The expansion of trade agreements and subsequent food product imports in Lebanon has compelled national authorities to develop food standards and regulations, as well as model projects and initiatives to facilitate trade, support the agro-industrial private sector, and promote consumers' health. As part of this effort, several specific initiatives have been undertaken by Lebanese officials to provide the food supply chain with technical transparency and support through the introduction of regulations and standards for local food-businesses, manufacturers, exporters, and importers. Specific legislation include several laws, decrees and decisions that update previous local food standards and regulations in accordance with international requirements.

The Ministry of Agriculture (MoA) in Lebanon plays an essential role in regulating food manufacturers and overseeing the health and quality of food products sold in Lebanon. This past year, Decision no. 720/1 was issued by the MoA, updating import conditions for manufactured and prepared animal products and modifying the standard's previous requirements. With 11 articles, this Decision addresses conditions and requirements that impose new requirements on prepared and manufactured products' importers. Importers must comply with each article of the decision in order to import and sell their products in Lebanon. The Decision is also directed at exporters in the countries of origin. The exporters need to comply with the Food Safety Management System's requirements and provide related certifications and documents. They are also required to collect the same information from their suppliers of raw materials.

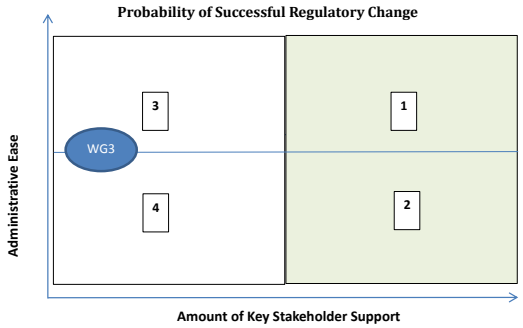
The Working Group on the Ministerial Decision no. 720/1 set out to perform an RIA to assess whether or not and to what degree the requirements for the import of Manufactured and Prepared Animal Products meet the intended objectives of the Decision. The RIA was intended to address the direct technical, resource, and cost impacts of the above mentioned Decision on the public

and private sector and the indirect and induced impacts it imposed on Lebanese consumers and businesses.

4.3.2 **Diagnostic**

WG 3 faced several difficulties in generating stakeholder support for completing an RIA on this topic. Foremost, the Working Group conducted their analysis on food safety during a period of significant regulatory change and instability with the government issuing numerous conflicting regulations, resulting from little to no cooperation between ministries and the private sector. The Working Group faced difficulties in identifying credible data sources to complete a thorough analysis, as most food product manufacturers and importers were unwilling to divulge proprietary financial information that would be necessary to assess the full costs and benefits of this Decision. As a result, a large number of the assumptions made as part of this RIA were based on orally collected data at Working Group meetings that raises questions as to the adequacy of this data as part of a credible cost-benefit analysis. In addition, during the RIA process new decrees were issued by the MoA that significantly impacted importers, exporters and producers of manufactured and prepared animal food products. Due to these issues, as indicated in Figure 14, the projection based on the criteria from section 2.2.1 above is that this assessment is not expected to result in successful regulatory change.

Figure 14: WG 3 Probability of Successful Regulatory Change



4.3.3 **Challenges**

Challenges encountered by this Working Group in assessing the impact of Decision 720/1 included:

- **Time:** Conducting a thorough and credible quantitative assessment can require significant time for data collection and analysis. Unfortunately, the Working Group conducted their analysis on food safety during a period of significant regulatory change and instability with the government issuing numerous conflicting regulations. While Working Group members were getting organized and the project team was gathering appropriate data to analyze the specific components of Decision 720/1, new decrees were issued by the MoA that also significantly impacted importers, exporters, and manufacturers of manufactured and prepared animal food products. As a result obtaining

stakeholder buy-in and collecting the necessary data for this specific RIA was difficult, as participants had a tendency to shift their focus to the most-recently issued decrees.

- **Stakeholder Buy-In** – The Working Group was unable to identify credible data sources to complete a thorough analysis, as food product manufacturers and importers were unwilling to divulge proprietary financial information, and very little publicly available/credible historical industry data/statistics currently exist to analyze the impact of Decision 720/1. One reason for this was the lack of stakeholder buy-in for the RIA methodology. As an example, one of the sub-working groups did not convene the appropriate stakeholders to address issues specific to processed cold cuts and were as a result unable to follow up on the specifics of the issue. This also proved difficult in data collection efforts as Working Group participants faced difficulty in gaining appropriate stakeholder buy-in. This organization has since re-organized its Working Group structure creating 12 functional Working Groups, bringing together the necessary stakeholders to address some of the decrees being issued by the MoA. A positive outcome of the RIA process is that Working Group participants have developed a better understanding of the purpose of performing RIAs and the resulting benefits that a credible RIA could bring in advocacy efforts with the MoA and other public agencies.

4.3.4 **Conclusion**

Although no specific quantifiable data was available, the team was able to compile a detailed summary of direct and indirect costs and benefits for each the 11 articles that made up Decision no. 720/1. In order to assess the overall cost/benefit of the Decision the next step for the Working Group will be to apply quantitative data to each enumerated cost and benefit to deliver a quantitative assessment of the net impacts and the expected time frame associated with this impact. Below are two tables (see Figure 15) the Working Group developed summarizing the costs and benefits of Decision no. 720/1 through a draft version of the PMW outlined in section 2.2.2 of this toolkit.

Figure 15: Decision 720/1 Benefit and Cost Summary - DRAFT PMW

Beneficiary	Article	Direct	Indirect/ Induced	Size (1-5)	Time (1-5)
Government	Factory Registration Requirements	X		TBD	TBD
Domestic Importers/ Manufacturers/Retailers /Exporters	Consumer Prodection and Public Health	X		TBD	TBD
	Transparency of Import Requirements	X		TBD	TBD
	Factory Registration Requirements	X		TBD	TBD
Consumer	Consumer Prodection and Public Health	X		TBD	TBD
	Factory Registration Requirements		X	TBD	TBD
	Inspection and Clearance Delays	X		TBD	TBD
	Limits on the Expiration Date and Shelf Life at Importation	X		TBD	TBD
	Transparency of Import Requirements	X		TBD	TBD

Cost Bearer	Article	Direct	Indirect/ Induced	Size (1-5)	Time (1-5)
Government					
Domestic Importers/ Manufacturers/Retailers /Exporters	General Compliance	X		TBD	TBD
	Inspection and Clearance Delays	X		TBD	TBD
	Limits on the Expiration Date and Shelf Life at Importation	X		TBD	TBD
	Regulatory Uncertainty	X		TBD	TBD
	Loss of Suppliers		X	TBD	TBD
	Reciprocal Export Requirements		X	TBD	TBD
Consumer	Loss of Suppliers		X	TBD	TBD
	General Compliance		X	TBD	TBD
	Limits on the Expiration Date and Shelf Life at Importation		X	TBD	TBD
	Regulatory Uncertainty		X	TBD	TBD

Once more data becomes available, the Working Group will be able to use this template and fill in the size and timeframe columns to better measure the relative impact of each article on the government, private sector and consumers.

4.3.5 **Advocacy Recommendations**

This RIA put the spotlight on the large number of regulatory decrees issued by the government for this commercial sector. Given the number of new and contradictory decrees that were issued within a short time period it would be very difficult (time consuming and costly) to perform an RIA for each decree. The Working Group may be more successful focusing on the regulatory "process" itself with the large number of frequent changes in regulation that make the regulations difficult to follow, track, evaluate, and advocate for or against. Shedding light on the process may lead to needed reform.

As an example, with the help of a credible analysis the Working Group could request that the MoA realign their operations, issuing an advance notice for each new decree and providing a comment period for private sector participants to identify any concerns. Such a step could significantly reduce the uncertainty associated with each decree, as private sector representatives would be given an opportunity to highlight their concerns to MoA officials, while providing additional time for the manufacturers, importers, and retailers to prepare for upcoming changes in the regulations.

4.4WG4: RIA of Draft of Article 47 of the Lebanese Patent Law Dealing with Protection of Confidential Information

4.4.1 **Background:**

Article 47 addresses issues of data exclusivity in the pharmaceutical industry, which requires the Lebanese government to protect "regulatory data" provided by pharmaceutical companies from other companies trying to use this information to replicate the products in the production of generic substitutes.

Regulatory data refers to test and clinical trial data generated by drug developers and submitted as necessary evidence of safety and efficacy for the successful registration of a product with the Ministry of Health in Lebanon. Most data exclusivity regimes grant a period of exclusive rights to the originator during which generic manufacturers are banned from relying on the original data to meet registration standards of safety and efficacy. In Lebanon, the interpretation of Article 47 by the Ministry of Economy and Trade grants generic manufactures free hand to rely on the original published data (on FDA websites, for example) to register competing products that are identical to the original products. Draft of Article 47 aims at defining exclusive data/secret data in a way that will protect research based pharmaceutical companies for a reasonable and specific number of years.

The Working Group comprised of multinational pharmaceutical manufacturers reviewing this issue was particularly concerned with inadequate protection of pharmaceutical regulatory data provided by the current interpretation of Article 47 of the Lebanese Patent Law. The Working Group conducted an RIA to measure the impact of implementing this regulation on private companies, foreign direct investment (FDI) and the Lebanese economy.

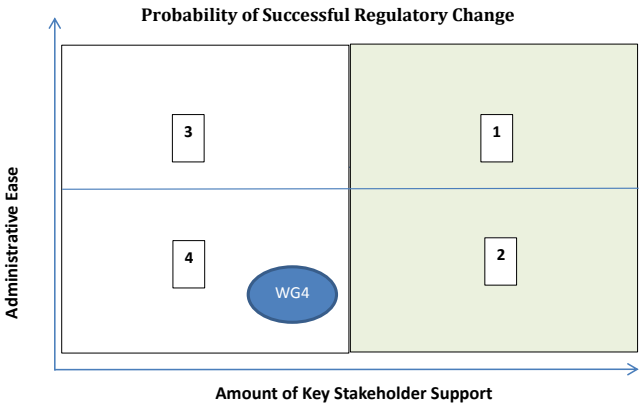
4.4.2 **Diagnostic**

Although Article 47 represented the special interests of the research-based pharmaceutical industry, this group identified a historical inability to engage with the Ministries of Economy and Health with regard to their concerns. Both ministries will have to provide their support in passing a new interpretation of Article 47. In the past, the Ministry of Health did not enforce Article 47

arguing that it was not within its jurisdiction, but within the jurisdiction of the Ministry of Economy and Trade. The Ministry of Economy and Trade, concerned with domestic manufacturing and importers that could be impacted by this interpretation, has also not enforced Article 47 presenting the argument that if the data is published, it no longer benefits from the protection provided by this regulation.

Based on their inability to gain attention from the regulating ministries, it was projected that this Working Group would likely not achieve successful regulatory change in the short to medium timeframe (see Figure 16). This conclusion was shared by many members of the Working Group. Their interest in this RIA stemmed from a need to be prepared with a quantitative assessment with which to approach these ministries in the future.

Figure 16: WG 4 Probability of Successful Regulatory Change



4.4.3 Challenges

The greatest overall challenge in the completion of this RIA was a deficiency in publicly available data on the Lebanese pharmaceutical industry and overall healthcare sector, and in engagement by the relevant ministries. To assess the costs and benefits of this regulation, assumptions had to be made and relationships interpreted in order to fill the gap for missing data on industry breakouts, output, production, R&D spending, etc. Assumptions and data gaps were filled using internationally-published literature on the implementation of data exclusivity in comparable economies to that of Lebanon over the past decade. In addition, significant input and guidance was provided by RIA experts and economists that have undergone similar analyses in the past and were comfortable with identifying appropriate proxy variables and data sets to fill in the gap for missing data sources.

4.4.4 Conclusions

A new interpretation of Article 47 is projected to show an overall benefit to the Lebanese economy.

Beneficiaries:

- In the short term the RIA shows an economic benefit to domestic generic manufacturers and international innovative manufacturers. However, as seen from similar occurrences in places such as India, Jordan, and Turkey, innovative manufacturers are also projected to appear in Lebanon's domestic market during the initial five years, increasing output and

the potential for investment and R&D related activities in Lebanon. The regulation will provide a sense of protection for these companies to market and sell their products without the risk of forfeiting their cost outlays over years of investment to copycat manufacturers.

- A change in this regulation is projected to provide wider access to pharmaceutical products and improvements in public sector regulation of pharmaceutical manufacturers, importers, and retailers. This is projected to reduce overall healthcare expenditures by reducing the cost of drugs, minimizing the potential negative side effects of generic drug usage, and lowering the costs involved with their historically-noted side effects (higher hospitalization rate, longer hospital stays, etc.). Given the allocation of total healthcare expenditures, 60% of which is currently funded by the private sector, this change could result in wider-ranging economic benefits resulting from increases in personal disposable income due to longer employment from increased health benefits.
- Lastly, this regulation is projected to enhance the business environment in Lebanon, making it more attractive to investment and international participation. This is expected to increase Foreign Direct Investment (FDI), availability of lower cost capital across all sectors of the Lebanese economy, potential output, and create new employment opportunities.

Cost Bearers

The only projected overall cost bearers will be the manufacturers, importers, and exporters of illegally traded copycat drugs that will likely be either converted into legitimate business operators or forced out of business due to improved regulation, but currently represent less than 10% of the Lebanese pharmaceutical industry. Any lost revenues and employment by these companies in the short-run is projected to be more than made up through increased investment and collaboration activities between legitimate domestic manufacturers, importers, exporters, and multinational manufacturers in the long-run.

4.4.5 Advocacy Recommendations

Based on the results of this analysis, the Working Group recommended that international manufacturers develop a new engagement strategy with the Ministries of Economy and Health moving forward. This strategy should focus on engaging more closely with domestic generic and innovative pharmaceutical manufacturers currently operating in Lebanon. Based on similar examples from Turkey, Jordan, and India, the completed RIA can help shape the argument for these companies to support the revised interpretation of Article 47 as beneficial to their long-term financial growth.

Domestic manufacturers are regulated by these ministries and are more likely to be seen as reflecting the domestic private sector interests versus those of the international community. Assuming successful engagement with domestic manufacturers, the most effective approach will be for these industries to directly engage with the Ministries of Economy and Health on their own behalf, reducing any predisposed bias about this regulation, and working to promote the results of this cost/benefit analysis within the necessary departments.

4.5 WG 5: RIA of Chamber of Commerce Industry and Agriculture of Saida and South (CCIAS) Proposal for Rezoning Industrial Land

4.5.1 **Background**

The industrial sector in Lebanon has experienced significant development over the past six years. However, inadequate reforms, coupled with weak infrastructure and low levels of investment, have undermined the sector's potential for development, specifically hindering its ability to increase its capacity to expand domestically and to develop a competitive advantage internationally.

Recognizing the need for governmental support for the industrial sector in the south of Lebanon and the need for improved infrastructure, the Chamber of Commerce Industry and Agriculture of Saida and South Lebanon (CCIAS) has identified land, is searching for investors, and is currently working with government stakeholders to change a regulation to rezone a plot of land solely for industrial activities. The hope is that with this new industrial zone in place, investors will be willing to take on the risk of investing in infrastructure to better serve industrial firms, while relieving some of the burden on the regional and local environment.

In this context, the CCIAS has formed a Working Group to conduct an RIA to assess the potential impacts of the new land regulation.

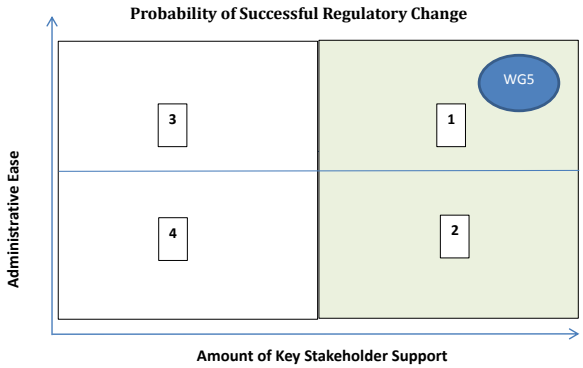
4.5.2 **Diagnostic**

The industrial sector accounts for approximately 16 percent of Lebanon's GDP, representing a major source of employment but also generating industrial effluents, solid waste and potentially toxic air emissions. Presently, the industrial agglomerations in South Lebanon are responsible for most of the liquid, solid, and gaseous emissions that are discharged into the environment, without any form of treatment. This is due to a lack of appropriate land and facilities for industrial activities and lack of government enforcement.

Given the environmental and public safety implications, the Lebanese Government is currently working to develop a more effective strategy for regulating these industries. As an example of the public sector concern and interest around this topic, in the years 2009 to 2010, the Ministry of Industry initiated in cooperation with Association of the Lebanese Industrialists (ALI) and with the technical assistance of United Nations Industrial Development Organization (UNIDO),

a survey directed at all establishments employing five or more employees. The aim of the survey was to map the industries, define the profile of industrial establishments, and evaluate their activities and financial performance. This survey provided the Working Group with extensive data on sector count, mapping and classification of industries, value-added statistics by industry sector, employment by industry sector, regional wages by industry sector, and private/fixed investment data by industry sector. In addition, CCIAS conducted a survey in 2009, focusing on approximately 1350 industries in Saida, Tyre, Nabatiye, and their suburbs. Based on these factors, the RIA Working Group had available to them a large number of data sources by which to conduct a full and credible cost-benefit analysis, leading to factual support of their position. As shown in Figure 17, the efforts of WG 5 are expected to result in successful regulatory change.

Figure 17: WG 5 Probability of Successful Regulatory Change



4.5.3 Challenges

For this Working Group, timing was by far the biggest challenge. Given the financial capital involved in purchasing and developing a specific plot of land that could be rezoned for industrial activity purposes, the CCIAS spent a significant amount of time examining geological, logistical and financial data to confirm their choice. Often in these instances funding availability does not align with data or resource availability. Institutions, organizations and individuals interested in undertaking a RIA need to be aware of these limitations before allocating valuable resources to such undertakings – another reason to undertake the diagnostic in section 2.2.1. However, as is usually the case with regulations and/or policies where industries and private sector institutions have a financial incentive, CCIAS accelerated the analysis process in order to ensure its timely completion.

4.5.4 Conclusion

The economic analysis of this investment and regulatory change shows an overall benefit to the Lebanese economy. Assuming a $33 million[15] investment by the private sector, with no direct cost to the government, this investment is projected to increase regional output, employment, and corporate and personal income tax revenue (See Table 5).[16] Estimates of economic impact are

[15] Assumes $9 million for the cost of land, $14 million to construct and upgrade surrounding infrastructure and $500 thousand every year to maintain the new infrastructure.

[16] Estimates of increases in output and employment did not take into consideration any of the additional environmental benefits that could be realized if the industries are required to operate in specific zones with better

based on direct, indirect and induced impacts to employment and output and were calculated for three time periods: Years 1-5, Years 6-10, and Years 11-20.

Table 5: WG5 Economic Analysis Impacts

Time Frame	Total Direct, Indirect and Induced Annual Output Increase ($M FY2012)	Total Direct, Indirect and Induced Employment Increase (Jobs)	Annual Government Tax Revenue Increase ($M FY 2012)
Years 1-5	$480	1725	$16
Years 6-10	$795	3290	$28
Years 11-20	$1,061	4504	$38

Private sector investors are expected to break even on their investment within 7 years, see an ROI of up to 40 % after 10 years, and up to 100% after 20 years.[17]

4.5.5 Advocacy Recommendations

The objective of the RIA was to support the CCIAS with "a data point" in their argument to government stakeholders and potential investors on the cost/benefits of this project and the need for their investment and support. Given the positive results of this analysis, CCIAS will be reaching to government officials highlighting the positive results of this RIA. With public sector support for this investment, CCIAS will have a better case for attracting private party investors to support the purchase of land and investment in the construction and maintenance of this new industrial zone.

5. Summary/Conclusion

This RIA Toolkit presents alternative methods for completing a cost benefit analysis relating to a new or changed regulation. It offers the analyst several options based upon data availability, degree of stakeholder engagement, and focus or intensity of purpose of group members. It includes a diagnostic exercise that is helpful for gauging the degree of success one faces in performing a RIA based on characteristics and conditions related to advocacy.

In addition to the "how-to" exercises, the RIA Toolkit provides five concrete examples of implementation of the RIA process based upon real-world examples in Lebanon over the course of a year by five Working Groups. Several informative outcomes of the Working Groups are noted:

---

infrastructure, where industries are more likely to register their operations and the government will be able to regulate emissions more effectively.

[17] When calculating the return on investment all benefits were discounted by an annual rate of 7.4%, based on Lebanese standards. This discount rate was meant to account for the market return (opportunity cost) that Lebanese private investors could achieve from investing their funding elsewhere in the economy.

- **Working Group 1:** The RIA brought to light the heavy reliance on the country's physical infrastructure for the successful delivery of products in the food and beverage sectors. This awareness highlighted the need for more active engagement by the private sector and government in investments in such infrastructure relative to other uses of public funds.
- **Working Group 2:** The high level RIA using the PMW indicated the importance of domestic marketing efforts and stakeholder engagement on the part of the public sector. Although short run impacts favored foreign honey producers, long-term results were more favorable if local businesses are able to increase their marketing efforts to generate more awareness of the quality of Lebanese honey, increase overall production levels to reduce their unit cost of production, and prepare for potential exporting opportunities abroad.
- **Working Group 3**: This RIA put the spotlight on the large number of regulatory decrees issued by the government for the animal products sector. Rather than just focusing on one decree, the Working Group identified that they could be more successful focusing on the regulatory "process" itself with the large number of frequent changes in regulation that make the regulations difficult to follow, track, evaluate, advocate for or against, and most of all prepare for. Shedding light on the regulatory process may lead to more impactful reform in this sector.
- **Working Group 4:** The results of this RIA shed light on some new advocacy strategies. The Working Group recommended that international pharmaceutical manufacturers engage more closely with domestic generic pharmaceutical manufacturers that are also expected to benefit from regulatory reform in the longer term. Domestic manufacturers are more likely to be viewed as reflecting the domestic private sector's interests versus those of the international community. Collaboration could result in regulatory reform that is favorable to both domestic and international firms.
- **Working Group 5:** This RIA noted the importance of timing. Given the financial capital involved in purchasing and developing a specific plot of land that could be rezoned for industrial activity purposes, Working Group members spent a significant amount of time examining geological, logistical, and financial data to confirm their choice. The RIA process made members better aware of how such time-consuming issues can influence the RIA completion process, leading to the exploration of options to expedite resolution of such issues.

Each Working Group found the RIA process to be an informative and a worthwhile undertaking. This conclusion is remarkable given the diversity of the Working Groups, differences in the regulatory issues selected, and complexity of the analyses conducted. While at times costly and time intensive, what this experience has also outlined is that RIA is a process that may take numerous iterations, but one that will provide value-added inputs to all affected stakeholders and overall economic growth to Lebanon along the way.

Appendix A – Process Model Worksheet

Page 1: Benefits Assessment

Process Model Worksheet©

1

Title/Name of Regulation:

Purpose (Intended) of Regulation (1-3 Sentences):

Key Stakeholders:

2

1. Name the Intended Beneficiaries and Benefit Type

2. When will each beneficiary realize the intended benefits?

- Government:
- Industry/Firms:
- Consumer, Civil Society:

Does the regulation offer/provide certain firms or individuals a competitive advantage such as preferential access to inputs, pricing advantages, et.al?

3

Name the Expected (Actual) Beneficiaries and Benefit Type (*Reproduce Table for Additional Beneficiaries*)

Beneficiary (specify for each subgroup)	Economic or Social/ Political	Direct	Size 1-5	Scope 1-5	Time 1-5	Indirect or Induced	Size 1-5	Scope 1-5	Time 1-5
Government	Economic	Beneficiary 1				Beneficiary 1			
		Beneficiary 2				Beneficiary 2			
		Subtotal				*Subtotal*			
	Social/ Political	Beneficiary 1				Beneficiary 1			
		Beneficiary 2				Beneficiary 2			
		Subtotal				*Subtotal*			
		Subtotal Government				**Subtotal Government**			
Industry/Firms	Economic	Beneficiary 1				Beneficiary 1			
		Beneficiary 2				Beneficiary 2			
		Subtotal				*Subtotal*			
	Social/ Political	Beneficiary 1				Beneficiary 1			
		Beneficiary 2				Beneficiary 2			
		Subtotal				*Subtotal*			
		Subtotal Industry/Firms				**Subtotal Industry/Firms**			
Consumer/Society	Economic	Beneficiary 1				Beneficiary 1			
		Beneficiary 2				Beneficiary 2			
		Subtotal				Subtotal			
	Social/ Political	Beneficiary 1				Beneficiary 1			
		Beneficiary 2				Beneficiary 2			
		Subtotal				*Subtotal*			
		Subtotal Consumer/Society				**Subtotal Consumer/Society**			
Total									

Definition of Beneficiaries

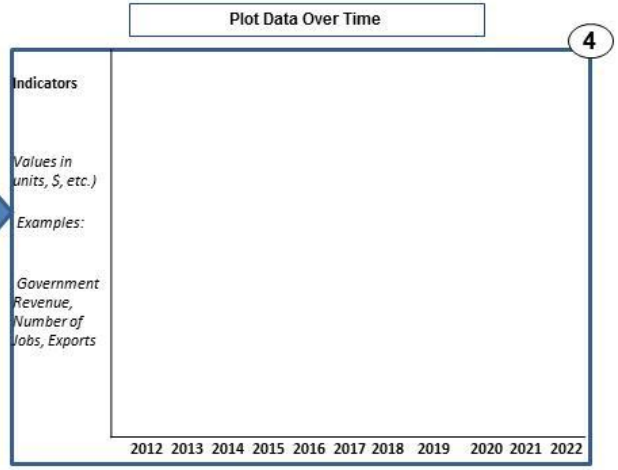
Direct=beneficiaries that are directly impacted as a result of the regulation (e.g., if the government issues a regulation to reduce pollution by prohibiting the dumping of waste near beaches, the swimmers are direct beneficiaries because they can now swim in clean water)

Indirect=additional beneficiaries that may be impacted as a result of the regulation (e.g., retail store owners whose revenue may increase as a result of added tourism in unpolluted coastal areas)

Induced=beneficiaries that are impacted as a result of actions by affected economic agents (e.g., as a result of the pollution regulation the general public may now experience fewer health problems easing pressure on payment of health benefits by employers)

Plot Data Over Time

4



Page 2: Costs Assessment

Process Model Worksheet©

5

Name the Intended Cost Bearer and Cost Type

- **Government:**
- **Industry/Firms:**
- **Consumer, Civil Society:**

When will each cost bearer be expected to pay the costs of the regulation?

Assessment of the ability of each cost bearer to avoid or shift the costs of the regulation, for example:

- For industry/firms: how much market power does each individual firm in the affected industry have?
- How specific is the capital in which each firm has invested?
- How will the consumer and government react?
- Other?

Definition of Cost Bearers

Direct=cost bearers that are directly impacted as a result of complying with a regulation (e.g., if the government requires all vehicles to have seat belts the auto manufactures will be the direct cost bearers due to added production costs)

Indirect=additional cost bearers that may be impacted as a result of the regulation (e.g., employers' overhead costs for added employees to make and install the seat belts)

Induced=cost bearers that may be impacted as a result of actions by affected economic agents but were not intended cost bearers by the regulator (e.g., consumers who are now paying more for vehicles with seat belts)

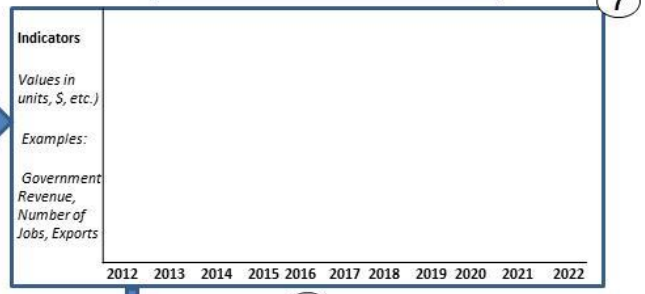
6

Name the Expected (Actual) Cost Bearer and Cost Type ***(Reproduce Table for Additional Cost Bearers)***

Cost Bearer (specify for each subgroup)	Economic or Social/ Political	Direct	Size 1-5	Scope 1-5	Time 1-5	Indirect or Induced	Size 1-5	Scope 1-5	Time 1-5
Government	Economic	Cost Bearer 1				Cost Bearer 1			
		Cost Bearer 2				Cost Bearer 2			
		Subtotal				*Subtotal*			
	Social/ Political	Cost Bearer 1				Cost Bearer 1			
		Cost Bearer 2				Cost Bearer 2			
		Subtotal				*Subtotal*			
		Subtotal Government				**Subtotal Government**			
Industry/Firms	Economic	Cost Bearer 1				Cost Bearer 1			
		Cost Bearer 2				Cost Bearer 2			
		Subtotal				*Subtotal*			
	Social/ Political	Cost Bearer 1				Cost Bearer 1			
		Cost Bearer 2				Cost Bearer 2			
		Subtotal				*Subtotal*			
		Subtotal Industry/Firms				**Subtotal Industry/Firms**			
Consumer/Society	Economic	Cost Bearer 1				Cost Bearer 1			
		Cost Bearer 2				Cost Bearer 2			
		Subtotal				Subtotal			
	Social/ Political	Cost Bearer 1				Cost Bearer 1			
		Cost Bearer 2				Cost Bearer 2			
		Subtotal				*Subtotal*			
		Subtotal Consumer/Society				**Subtotal Consumer/Society**			
Total									

Plot Data Over Time

7



8

Final RIA Assessment	
Stakeholder Benefits	**Values**
Government Subtotal	
Industry/Firms Subtotal	
Consumer/Society Subtotal	
Total Benefits	
Stakeholder Costs	**Values**
Government Subtotal	
Industry/Firms Subtotal	
Consumer/Society Subtotal	
Total Costs	
Benefit / Cost Ratio	

Sample Benefit to Cost Ratio

$\frac{16.4}{8.2} = 2$

>1 = Net Benefits, Accept
<1 = Net Costs, Reject