Study of the consequences of the application of sanitary and phytosanitary (SPS) measures on ACP countries

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Summary

The Agreement on the Application of Sanitary and Phytosanitary Measures (the SPS Agreement) came into force in 1995. The EU has always maintained a strong body of legislation related to consumer health and safety in the area of foodstuffs. However, in recent years these SPS measures have increased significantly to the extent that they are regarded as a barrier to imports from ACP countries whose exporters find difficulty in complying with the EU requirements. These difficulties are compounded by the continuing erosion in the level of ACP competitive advantage derived from EU preferences.

The study examined what particular EU SPS legislation gives rise to this situation and attempts to identify the channels through which its effects are transmitted, and assesses the impact on ACP country exports and infrastructure and on individual exporters/growersprocessors, etc.

Findings

The study was based around existing published reports, supplemented by discussions with organisations (FAO, Codex, CDE, CBI, COLEACP, etc.) having an important role in SPS issues, and written and telephone contacts with a range of other market oriented informed opinion (importers, standard setters, etc.).

The study found that although the general body of EU legislation is complex, it is in the process of being rationalised by the Commission. This has facilitated the identification of 24 Regulations and Directives that represent the principal source of SPS-related impact on ACP countries. Details of this legislation are set out in Annex B. Of these, three have been identified as representing the principal source of impact on ACP countries:

- **The General Principles and Requirements of Food Law EC R178/02.** This establishes the concept of “Farm to table” and imposes on EU importers an obligation of tracing in relation to products in the food chain. This is increasing the power of importers over the whole food chain to the exclusion of some small ACP exporters.

- **The Pesticide Regulation on MRLs EC Directive 91/414.** This establishes Maximum Residue Levels for some products, which are difficult for many ACP countries to accept and threatens to prevent the usage of many traditional pesticides.

- **New Hygiene Regulations replacing EC/93/43.** This introduces a new emphasis on Hazard Analysis Critical Control Point systems to ensure consumers’ safety and is encouraging importers to pressurise ACP exporters to adopt the costly activities the system involves.
These Regulations also continue a general Harmonisation of EU import procedures, of which one scheduled for the end of 2003 (Decision 2001/4), and will result in the cessation of fish imports from some countries that do not have the required certification infrastructure.

The study also examined the way importers and large retail chains have incorporated EU legislative requirements into sector oriented Codes of Practice. Whilst these constitute a useful package of guidance and information for exporters on how to meet EU SPS requirements, they sometimes also go beyond pure health and safety concerns and include social and environment requirements under the umbrella of the need for SPS conformity.

The impact of various EU legislation was also examined in terms of its importance to both individual countries and particular products.

Whilst all ACP countries have a degree of export relationship with the EU, this is negligible in some countries e.g. the Pacific largely looks to Australia and New Zealand and the US for their export markets. For other countries, however, EU trade is very important and analysis revealed that some 17 countries accounted for approximately 83% of ACP exports in the product areas likely to be most affected by SPS measures:

- Ivory Coast
- Cameroon
- Madagascar
- Uganda
- Kenya
- Namibia
- Zimbabwe
- Seychelles
- Ghana
- Senegal
- Tanzania
- Jamaica
- Mauritius
- Nigeria
- Papua New Guinea
- Mauritania
- Guyana

The impact on products was fairly consistent with all fruit and vegetable exports being affected to a noticeable extent. Whilst this impact related mainly to additional costs for some exporters for other smaller producers and outgrowers, the impact is even more serious, and is reflected in some companies being deterred from any exporting to the EU. The high costs of making initial compliance is also an obstacle to firms currently supplying exporters to move into the higher added-value sector of food processing for export.

Of all sectors however, fish is likely to be impacted the most in the near future because of the harmonisation in EU authorisation procedures. The study identifies 16 countries that are at risk of being excluded from their traditional EU markets:

- Antigua & Barbuda
- Rep. of Congo
- Gabon
- Papua New Guinea
- Angola
- Cameroon
- Grenada
- Suriname
- Belize
• Eritrea • Benin • Zimbabwe
• Kenya • Fiji • Mozambique

Cost estimates

Although it was beyond the scope of this study to carry out a definitive cost analysis for individual countries or firms, the study identifies a range of specimen cost indicators that all flow directly from EU SPS requirements. Compliance costs cover a range of activities including certification, inspection and analytical bodies for countries and a requirement for sophisticated process plant, technical/managerial personnel and higher pesticide expenditure for businesses.

These indicators are set out in the form of a “Needs Menu” and a “Costs Menu” for both countries and individual firms on the basis that at some time all countries and all firms will need to implement some (if not all) of the measures set out. It is considered that whilst local conditions may affect the actual costs incurred by any particular organisation, these will be in the order of magnitude of the examples provided. Examples include control and monitoring at a 5/6 control point HACCP system of US$93,000; upgrading fish processing plants at US$6,000 each and certification costs ranging up to US$8,000.

In addition to country and firm specific costs, the study looks at several possible indicators of the size of the overall cost to ACP countries of SPS measures. Although it is not possible to arrive at any definitive figure without a large and more comprehensive study, a figure of between €140m and €700m is calculated as likely to represent the annual ongoing cost to the ACP private sector exporters. This is based on estimates that SPS measures represent overheads of between 2% and 10% of the value of produce exported by the vast majority of ACP exporters. This excludes the initial (often larger) cost of compliance.

Conclusions and recommendations

In its conclusion, the study identifies the need to focus more assistance at the sub-sector level, particularly to small firms who are often overlooked by the large technical assistance schemes of many aid agencies. Several recommendations are made, which it is considered will alleviate some of the impacts identified in the study:

• Public private partnerships (PPPs)
Large EU supermarket chains should spread the cost of wider sector SPS compliance throughout the food chain via PPPs with national governments.
• **Local inspection sites**
To overcome the inadequacy of developing countries being able to challenge EU import bans quickly, local inspection sites should be established and manned by inspectors from a number of states to reduce the harmful effects of such bans.

• **Delay implementation of EU conformity assessment procedures in fish imports**
As the effect of this legislation will be exclusion of some countries, the action should be delayed until the technical assistance programmes make these countries compliant. No health risk arises from such a delay.

• **Regional accreditation bodies**
There are insufficient accreditation bodies in ACP regions. The establishment of a regional network to augment the existing International Accreditation Forum would reduce the costs of expensive foreign accreditation and improve the quality of some certification.

• **Micro credits for micro purchases**
A need exists to assist the very small business to acquire basic SPS equipment. Often commercial loans are not available to these firms and the provision of a fund dedicated to this purpose and supporting the work of Bureaux of Standards would go far in alleviating the SPS problem at the “grass roots” level.

• **Piggy backing schemes**
Assistance should be given to encouraging firms in the EU to form JVs with ACP countries through schemes based on the concept of the UNIDO Investment and Technology Programme Office (ITPO) network.

• **Possible legal issues**
The way the concept of Traceability and Equivalence are tackled by the EU may be placing an unfair burden on some ACP countries and suppliers of particular produce. An expert in European and WTO law should examine these two issues to see whether the EU can be challenged on its implementation procedures and their discriminatory impacts as opposed to the legality of the concepts.

**Annexes**
The study is supported by statistical annexes covering EU/ACP export trade, sectoral GDP and employment and a list of EU legislation considered to form the basis of the majority of EU SPS impact on ACP countries.
1 Introduction

This study is aimed at identifying the impact of the application of sanitary and phytosanitary measures by the EU on exports from ACP countries. Much work has already been carried out in this field but little has been directed at attempting to quantify the influence of these measures either in terms of how they actually may act as a trade depressant on individual country’s export potential or impose additional costs onto firms’ specific production/supply chain.

The scope and resources required to fulfil such a wide remit would of course be large, in terms of both finance and time involved. It would also involve the use of economic models designed to identify wider factors such as trade diversification and opportunity cost etc. This study does not purport to reflect the kind of findings that such a wider ranging and comprehensive investigation might produce. Instead, it seeks to provide an indication of the principal sources of SPS measures in the EU and to identify specifically which countries and products are most adversely impacted by these. It also seeks to set out the types of compliance measures individual exporters, growers, processors, etc., have to adopt. Alongside this, the study has gathered together examples of typical costs of a range of activities, both at national and firm specific level, that flow from EU SPS requirements.

The study itself was carried out over a period of six weeks and involved (a) review of existing published material on the subject; (b) written enquiries to over 60 organisations and individuals seeking specific information on costs and impacts, Codes of Practices etc.; (c) telephone discussions with over 40 individuals having specialised background e.g. UK importers/supermarkets, BSI/ISO standard setters, etc., and (d) meetings with important organisations working in this area, e.g. FAO, Codex, CDE, CBI and COLEACP.

The results of the study are set out in the first six sections and attempts as far as time and resources have allowed to answer the following sequence of questions – “What are the SPS measures?”; Who imposes them?; “Who is impacted by them?”; “What is this impact in financial and other terms?”; and “What are the Technical Assistance Programmes available?”

The final section, section 7, contains some general conclusions and specific recommendations for actions that would alleviate some of the impacts.
2 Origin of problem areas and trends

2.1 The SPS Agreement

The SPS Agreement contains procedural rules for the formulation and application of sanitary and phytosanitary measures in international trade. The Agreement covers all measures to protect human, animal and plant life or health. Such risks are seen as arising principally from pests, diseases, disease carrying and disease-causing organisms, additives, contaminants, toxins or disease-causing organisms in foods, beverages or foodstuffs.

Thus the Agreement effectively defines what a “SPS measure” is. The Agreement does not, however, establish norms or standards, leaving this to the relevant international organisations or the WTO member states. The Agreement makes clear that whilst any level of health protection can be adopted, this must be based on scientifically based evidence. In cases where adequate scientific evidence is not yet available, an importing state is allowed to provisionally adopt “precautionary” measures for a limited period.

The two basic principles of the Agreement are:

- The principle of non discrimination
- The principle of scientific justification

The principle of non-discrimination is described in Art. 2.3 of the Agreement. This principle is the SPS Agreement equivalent to the GATT basic principle of most favoured nation status. A measure shall not discriminate against or between trading partners more than is necessary to reach its goal of sanitary and phytosanitary protection. The principle of scientific justification is spelled out in Art 2.2.

The Agreement also has a number of instruments that are used in achieving its objectives. Fig 2/1 describes the components of the Agreement together with a summary of its functioning.

2.1.1 Risk assessment

An SPS measure has to be backed by a risk assessment that provides a scientific justification for the relationship between the measure and the level of protection targeted (Art 5.1-5.3). The requirements of the Agreement are generally seen as high and even developed countries face a substantial task when they have to provide a risk assessment robust enough to be judged in conformity with the Agreement's provisions.
2.1.2 Rules on setting protection levels

Arts 5.4-5.6 and 5.8 describe how the anti discriminatory principle is to be used in practice. A risk assessment is a necessary but not solely sufficient condition for an SPS measure to be in conformity with the Agreement. In addition, a measure must be the least restrictive to trade among the available alternatives and it shall be no more restrictive to trade than necessary to achieve the desired level of protection. The protection level provided by an SPS measure shall be consistent with the levels resulting from other measures in similar situations.

**Fig. 2/1: The SPS Agreement**

Aim: To allow countries to protect themselves from trade related risks to human, animal and plant health while avoiding that the risks give rise to regulatory protectionism.

**General principles**

<table>
<thead>
<tr>
<th>Non discrimination</th>
<th>Scientific Justification</th>
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<tbody>
<tr>
<td></td>
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</tbody>
</table>

**Instruments**

<table>
<thead>
<tr>
<th>Risk Assessment</th>
<th>Equivalence</th>
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</thead>
<tbody>
<tr>
<td>Rules on setting protection levels</td>
<td>Regionalisation</td>
</tr>
<tr>
<td>Exception in the case of insufficient Evidence</td>
<td></td>
</tr>
<tr>
<td>Harmonisation</td>
<td>Transparancy</td>
</tr>
</tbody>
</table>

**Special concerns**

Developing countries

**General functioning of the Agreement**

<table>
<thead>
<tr>
<th>Cases where international standards have already been signed</th>
<th>Harmonisation based on international standards</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cases where international standards have not been signed</td>
<td>Individual country measures allowed based on risk assessment</td>
</tr>
<tr>
<td>Cases where a member desires a higher level of protection than provided by international standards</td>
<td>Stricter measures allowed when based on risk assessment and non discrimination</td>
</tr>
<tr>
<td>Cases where scientific evidence on which standards must be based is insufficient</td>
<td>Temporary measures allowed</td>
</tr>
</tbody>
</table>

Measures that comply with the standards, guidelines and recommendations developed by the three international organisations Codex Alimentarius Commission, International Office of
Epizooties and International Plant Protection Convention (IPPC) are deemed to be compatible with the SPS Agreement.

All proposed SPS measures must be notified to the WTO’s SPS committee before they come into force and other members have an opportunity to challenge the scientific basis for action. Members are also required to accept the SPS measures of other members where these can be demonstrated to be equivalent and offer the same level of protection. This protects exporting countries from unjustified trade restrictions even when those products are produced under simpler and/or less SPS standards. However, in practice the right of importing countries to test imported products limits the right of equal treatment.

<table>
<thead>
<tr>
<th>Fig. 2/2: Distinction between technical regulations and sanitary and phytosanitary measures</th>
</tr>
</thead>
<tbody>
<tr>
<td>Whether a particular regulation to protect the health and life of a country's human and animal population or of its plants and fauna is a technical regulation or a SPS measure depends on the objectives for which it has been adopted. The distinction is important, as the rules of the TBT Agreement would apply if the regulation is treated as a technical regulation and those of the SPS Agreement if it is treated as a sanitary and phytosanitary measure.</td>
</tr>
<tr>
<td>In general, a measure is a SPS measure where its objective is to protect</td>
</tr>
<tr>
<td>• Human life from risks arising from additives, toxins and plant and animal borne diseases</td>
</tr>
<tr>
<td>• Animal life from the risks arising from additives, toxins, pests, diseases, disease carrying organisms</td>
</tr>
<tr>
<td>• Plant life from the risks arising from pests, diseases, disease carrying organisms</td>
</tr>
<tr>
<td>• A country from the risks arising from damage caused by the entry, establishment or spread of pests</td>
</tr>
<tr>
<td>Regulations adopted for other purposes even though they are designed to protect human, animal and plant life would be treated as technical regulations (re TBT measures).</td>
</tr>
</tbody>
</table>

Source: WTO

2.1.3 Impact on developing countries

In theory, the SPS Agreement should help developing countries trade with the EU as it acts as a protection against measures that are not based on scientific evidence of harm to humans. A problem arises, however, where countries do not have the ability to take full advantage of the Agreement’s provisions. The Agreement itself acknowledges the particular problems faced by developing countries and has provisions for special and differential treatment. (See Fig. 2/3).
**Fig. 2/3: Special treatment for developing countries**

The preamble to the Agreement recognises that developing countries may have special difficulties in complying with the SPS requirements of developed countries and, as a consequence, in access to markets. This difficulty extends to the formulation and application of SPS measures in their own territories. The Agreement seeks to assist such countries.

- **Choice of measures**: members are allowed to take into account the technical and economic feasibility of SPS measures when choosing how to reach desired protection levels (Art 5.6). This relates to the lower level of technical and economic assistance to developing countries (Art 9.1).

- **Technical assistance**: members must facilitate the provision of technical assistance to developing countries (Art 9.1).

- **Technical assistance**: A member must consider providing technical assistance to a developing country if it introduces new measures that threaten to severely restrict market access (Art 9.2).

- **Special and Differential Treatment general**: special care must be taken when preparing and applying SPS measures when developing countries in general and least developed countries in particular are involved:
  - **Time frames**: when possible, a developing country should be given a longer time for implementing new measures (Art 10.2)
  - **Exceptions**: In special cases, the SPS committee is authorised to provide limited exemptions (Art 10.3)
  - **Participation in Standards Setting Bodies**: Members should encourage and facilitate the active participation of developing countries (Art 10.4)

- **Exemption** from the demand of providing copies of SPS legislation (Annex B, Art 8)

- **When a country notifies measures** of products of particular importance to developing countries, the Secretariat must draw attention of those countries to the notification (Annex B, Art 9)

Note [1] At the Doha Ministerial meeting it was agreed to strengthen the obligation by amending the wording to should provide assistance.

These provisions should in theory ease the problems developing countries encounter in complying with EU SPS measures. However, there have been disputes about the level of compliance with the terms of the Agreement by developed countries (Henson 1999) in particular relating to what is seen as insufficient assistance to alleviate the capacity constraints, which effectively limit the ability of exporters to meet the increasing level of technical SPS requirements. Two other areas of particular concern are equivalency and participation in standard setting.
2.1.4 Equivalency

The equivalency provision of the Agreement is potentially one of its elements most valuable to developing countries but there are few examples of equivalency having been established (Henson and Wilson 2002). Concern exists within developing countries that importing countries are looking for “sameness” instead of equivalency of measures. This basically deprives Art 4.1 of its function, which is to recognise that different measures can achieve the same level of SPS protection. This flexibility is particularly important for many of the ACP countries, which face climatic, developmental and technological conditions that differ from those prevailing in developed regions like the EU-15.

2.1.5 Participation in standards setting

Art 3.4 instructs members to play a full part within the limit of their resources, in the relevant international organisations and their subsidiary bodies. Specific mention is made of Codex Alimentarius, the International Office of Epizooties and the international and regional organisation operating within the framework of the International Plant Protection Convention.

However, developing countries generally and small economies particularly (e.g. the island communities of the Pacific) are at a significant disadvantage as they often lack the human resources and/or expertise necessary to participate in the work of these international organisations, which are often extremely time consuming. This largely accounts for the limited input of developing countries in the development of standards and lack of ownership in the process. A related impact is that this lack of involvement can also inhibit harmonisation with and implementation of the adopted standards, guidelines and recommendations in these countries.

2.2 The legislative requirements of the EU

The body of EU legislation that implements the provisions of the SPS Agreements constitutes a complex and overlapping series of Regulations and Directives that have been introduced over the period since the establishment of the EU (and its predecessors in 1957. This pre-dates the SPS Agreement by nearly 40 years. Much of this is composed of amending legislation that leads to some estimates putting the level of Official Instruments at in excess of one thousand.

Much work has already been carried out on the problems associated with the increasing coverage of EU requirements in the area of health and hygiene. Despite the large volume of paper reference to the work of authors such as Guenther, Henson, Wilson et al, a relatively short list of some 24 Regulations and Directives represent the principal source of impact on ACP countries’ exporters. These are set out at Annex B together with a short summary of the coverage of each piece of legislation.
This list covers both general (horizontal) type legislation such as relating to Pesticide usage and product specific (vertical) legislation – for example, mangoes. Although still in force, the individual legislation will be affected by a recent review by the Commission of all EU food hygiene rules. Under this, a new Regulation will merge, harmonise and simplify the existing 16 product-specific Directives and the important General Directive 93/43\(^1\) through a package of four Regulations and a guideline for appeal. Another particular effect of these regulations will be to include primary agricultural production into general legislation on hygiene.

The effect of this “tidying up” operation will be increased by its introduction as a Regulation which is directly implementable by EU member states as opposed to a Directive that allows variation by member states in the way it is translated into national legislation. This should go some way to easing the problems ACP exporters have found in encountering different national entry requirements for importing the same product into the EU “single market”. These differing requirements have largely resulted from the relevant EU legislation being a Directive rather than a Regulation.

### 2.2.1 Principal problem legislation

Whilst the list at Annex B represents the main body of legislation likely to impact on ACP countries, it is possible to identify a few specific items that are likely to be the origin of the bulk of problems.

- **General Principles and Requirements of Food Law - EC R 178/02**

  This Regulation establishes the “Farm to Table” approach and encompasses all aspects of the food production chain. This runs from primary production and the production of animal feed up to and including sale or supply of food to the consumer.

  The Regulation also sees the food and feed business operator as best placed to devise a safe system for supplying food and ensuring that the food it supplies is safe. The primary legal responsibility is thereby with the producer or importer who for his or her own protection necessarily requires the ability to trace food back through the import chain to the source. The organisation of tracing has not been an obligation in the past and importers’ demands will require the introduction of comprehensive tracing systems by importers.

\(^1\) Currently a number of foodstuffs of animal origin are regulated by specific provisions, while a general Directive 93/43 on hygiene of foodstuffs applies to all other products, including fruit and vegetables.
• **Revision of Hygiene Regulation EC/ 93/ 43**
The new Regulation will be comprehensive and bring together several areas that had been separately covered and introduces new increased emphasis on the system of Hazard Analysis Critical Control Point (HACCP). Its main elements are:

- General hygiene regulations that are separate for primary production and further processing
- Self inspection plan in accordance with HACCP
- Guidelines for “Good Procedural Practice”
- General registration requirement for businesses and a labelling requirement for foods regulations governing records of origin and traceability.

The increased emphasis on producer responsibility will be based on the HACCP system.²

A second important sector-specific aspect of the regulation is the stated intention to harmonise all EU import procedures for fish. This means an end to the existence of two lists of importers; List 1 countries are allowed free circulation throughout the Single Market and List 2 countries are restricted to specific member states territories. By Decision 2001/4, the Commission has decided to make all importers comply with the same rules. Because these will require certifying bodies in exporting countries to be authorised by the EU a risk exists to imports from countries currently supplying limited EU markets (List 2.). Many of these countries do not have adequate facilities to satisfy the EU. Details of the countries affected are covered in Section 3.

At present, HACCP is considered impractical for application in the farming sector and Codes of Good Practice are to be used as the safety management instrument. The Directive recommends the use of ISO 9000 series on quality and quality assurance systems as a means of ensuring compliance with the Directive’s provisions.

• **The Pesticide Regulation on MRLs EC Directive 91/ 414 (and subsequent)**
The EU MRL harmonisation programme aims at establishing common and obligatory MRLs for all active ingredients approved for use within the EU. This should eliminate inconsistencies in national MRLs. Under its Pesticide Approvals Review Programme, it is intended to systematically review the registration of the 823 active ingredients approved for use within the EU prior to 25 July 1993. The continued registration of a pesticide depends on appropriate data being generated and submitted by interested parties (usually agrochemical companies).

This means that in practice only those active ingredients, which are commercially important, are likely to remain registered for use. It has been estimated that at least 350 out of the 823

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² HACCP prescribes a sequential series of steps and particular stages that have to be identified throughout the production chain where hygiene or safety of the product could become compromised and checks have to be made.
active ingredients will be withdrawn. The MRLs of these substances will be set at LOD unless producers outside the EU are able to secure import tolerances upon submission of a complete residue dossier.

Market opinion is that in the absence of agrochemical companies investing in generating data to defend registration of MRLs of older, out-of-patent pesticides many developing countries will be unable to complete the necessary dossiers to enable continued use of many significant pesticides which are mainly relevant to use in tropical regions.

Fig. 2/4: The EU Food and Veterinary Office

The FVO carries out on the spot inspections to evaluate the food safety control systems operated by national authorities both in Member States and in third countries. It also has responsibility for monitoring control activities on animal health, animal welfare and plant health.

The FVO is required to verify that the competent authorities in food exporting countries are capable of ensuring that EU requirements are met in respect of all products exported to the EU. For certain products the FVO inspects individual production establishments of which there are approximately 15,000 approved for export to the EU and also monitors the operation of approximately 290 inspection posts that check imports of animals, animal products and food of animal origin at the point of EU entry.

A new approach developed under the Commission’s review of EU hygiene legislation combines the three aspects of control – verifying transposition, receiving reports from countries and carrying out on the spot inspections into an integrated control process, which will also apply to third countries.

Source: EU Commission

2.3 EU private sector requirement

2.3.1 Codes of practice

Whilst the SPS Agreement and the body of EU legislation associated with health and safety is usually the primary source of concern about SPS measures the way in which these requirements are implemented is also attracting growing attention.

There is increasing pressure on EU importers both by EU and National Authorities and the consuming public to ensure that the products they sell in the EU market place are completely safe and constitute as low a risk to human health as can be technically measured. This has led to a proliferation of sector oriented Codes of Practice (COPs) incorporating a range of standards relating to all the elements that make up the food management chain (growing, processing, handling etc.).

These COPs are not mandatory and have no force in law but given that importers will only purchase from exporters who comply with the particular sector requirements set out in these COPs, there may be little distinction in practice between COPs and mandatory standards. In some cases, there is a close relationship between the “voluntary” standards expressed in a
COP and ISO standards as compliance with the one may contribute to satisfying the
requirements of the other.

Some pros and cons of COPs: It is possible to argue that compliance with these COPs is in the
interest of developing country exporters because by so doing they make their products more
competitive and attractive to EU consumers. Compliance however involves exporters in
extra costs related inter alia to training personnel, purchasing additional equipment and
paying fees and charges relating to inspection and auditing by third party organisations.

These are all costs that an exporter in a developing country generally finds difficult to meet
but has no choice if he wishes to continue exporting to the EU. Henson makes the point
that the costs incurred by developing countries in supplying developed countries’ markets
tend to be greater than the costs incurred by developed countries in supplying the same
markets. This asymmetry in costs of compliance will clearly favour trade flows from
developed to developing countries and underlines the potential benefits to developing
countries of greater harmonisation of SPS standards generally.

2.3.2 Increasing power of importers

With the growth in the number of COPs has come an associated increase in the power of
the large retail chains. Consolidation within the EU in the retail sector has resulted in an
increasing concentration of power in the hands of a decreasing number of importers of food
produce. Large supermarkets have consistently expanded their range of produce over the
past 20 years to include foods that were previously supplied by small specialist outlets such
as fishmongers and butchers. Many of these outlets have now vanished leaving
management of the food chain in the hands of large retail chains that are fighting each other
for market share. Guenther suggests that eventually perhaps 15 huge retail chains will
control 80% of the fresh produce sales to an expanded EU population of 450m.

Such concentration of power in the hands of importers in developing countries major
export markets basically moves the primary decision-making away from the developing
country to the importing EU bloc. In some instances, this may not matter but a clear
danger exists that in their quest for market share some retail organisations may seek to
exercise their power over the chain of supply to impose non-SPS conditions on the various
suppliers within it. Examples exist in the UK of supermarkets seeking to differentiate their
produce from their competitors by requiring that suppliers also abide by social or
environmental conditions. Where these are incorporated under the umbrella of a SPS COP
to be met by exporters it is clear that extra costs are being imposed that have nothing to do
with the spirit of the SPS Agreement.

An additional consequence of the increased pressure for “safe” products on EU importers is
their growing preference to deal only with large production units in developing countries.
This reduces the level of risk to the importers, as large producers are more able to undertake

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3 Impact of Sanitary and Phytosanitary Measures on Developing Countries 2000
the compliance measures than small producers are. Unfortunately, for developing countries, this can result in the smaller grower/producer being totally excluded from its major export market.

Argument of the large retailers: Proponents of the large retail importers justifiably contend that they assist their suppliers by helping them form co-operatives capable of supplying consistent and quality controlled volume exports and supplying technical training and inspection services. This is obviously to the benefit of those companies that are involved with the importers but the impact on the country and sector may be to effectively stifle any new entrants to exporting. It may also be argued that whilst the “favoured” exporters are benefiting from this arrangement the relationship is not one of equals. The exporter has little bargaining power and can be subject to pressure from the importer’s “chain manager” to change production methods, cut labour costs, impose new social standards etc so that the retailer can maximise his commercial advantage from the relationship.

Supply chain: Fig 2/5 shows the supply chain for fruit and vegetables linking production with consumption. Within this, the supermarkets and other retailers exert backward influence through COPs and contractual arrangements on three principal sources of primary produce – sole producers, private co-operatives of small growers and large fruit combines. (Fig 2/6 details what each of these three groups covers). Each level of supply has an increasing amount of activity and value added for the exporter but also must meet additional COP requirements.

Private sector COPs do therefore serve a useful purpose in arranging the SPS requirements of the EU in packages that can be fairly easily understood by particular sectors. What is not so useful from the point of view of the many small companies that make up the bulk of ACP exporters is that they generally have little say in the actual production of these sector requirements⁴. That said it must nevertheless be acknowledged that some countries have established significant institutional capacity to the extent that their national Codes of Practice are entirely compatible with EU requirements. The national code of Zimbabwe, for example, is wider and more encompassing than EUREPGAP coverage⁵.

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⁴ Although some organisations like COLEACP do have close relationships with standard setters in developing countries and involve them in consultations about new COPs the degree to which this is common practice is not high.

⁵ Sets standards on behalf of EU retailers of fruit and vegetables.
Fig. 2/5: Principal players in the supply chain of fresh fruit and vegetables to EU markets

Source: CBI
Although there is a range of COPs covering both large and niche sectors, they all require much the same compliance procedure. This is aimed at providing tangible evidence on which risk analysis can be based to satisfy the importer that he is not being exposed to potential liability in respect of “unsafe” products being sold to EU consumers. The elements of this are common to all COPs and in broad terms include verification that officially recognised “unsafe” foreign bodies (pesticides, contaminants etc) do not come in contact with the produce or are made harmless/removed prior to export. This is achieved through inspection and/or laboratory analysis and confirmed in the form of a certificate of compliance issued by a third party specialist auditing body.

The main difference lies in the degree of sophistication of the requirements, which get more complex as the coverage of the chain increases e.g. processing may include extensive risk management systems and technical control points such as in the HACCP system. Increasingly importers are exerting their influence over greater parts of the supply chain because certifying bodies cannot certify compliance for an isolated part of the chain e.g. processing without also having verified that the input to the process (from the producer) is also EU compliant (see Figs. 2/5 and 2/7). This is forcing the hitherto independent players in the chain into closer trading relationship with their importing customer. Whilst obviously a positive in terms of reducing food safety risks overall the situation also can create a dependency on the importer, which can be to the disadvantage of elements in the downstream supply chain.
Fig. 2/7: Indicative management control chain and the application of the codes of practice

<table>
<thead>
<tr>
<th>Input</th>
<th>Output</th>
</tr>
</thead>
<tbody>
<tr>
<td>Field Activity</td>
<td>Production</td>
</tr>
<tr>
<td></td>
<td>Transport</td>
</tr>
<tr>
<td></td>
<td>Pack House</td>
</tr>
<tr>
<td></td>
<td>Storage</td>
</tr>
<tr>
<td></td>
<td>Transport</td>
</tr>
<tr>
<td></td>
<td>Distribution</td>
</tr>
<tr>
<td></td>
<td>Centre Market</td>
</tr>
<tr>
<td></td>
<td>Transport</td>
</tr>
<tr>
<td></td>
<td>Storage</td>
</tr>
<tr>
<td></td>
<td>Consumer</td>
</tr>
</tbody>
</table>

Eurep Gap       | BRC               | BRC               | BRC               |
MPS            | HACCP             | HACCP             | HACCP             |

Source: SGS, Société Générale de Surveillance

2.3.3 Principal issuers of codes of practice

Although there are a number of issuers of COPs, many of these are oriented towards the EU domestic supplier. In addition, some COPs are environmentally or socially inspired and have only incidental relevance to SPS concerns. Of these environmental based requirements, do have some relevance to food safety by focusing on the elimination of air, water and soil contaminants as these represent potential health hazards if they enter the food chain in sufficient concentrations.

The following are the principal originators of COPs. Their codes are also sometimes adopted by sector representatives and re-issued with some additional requirements relating to labour conditions, environment or ethics. The inclusion of these additional features does not alter the basic implementation tools that an exporter has to employ to demonstrate compliance.

- **Eurep**
  
The best known and probably widest used COP is Eurep Gap, which relates to Eurep’s Good Agricultural Practice and Good Packhouse Practice for fruit and vegetables. Eurep is also involved in a new livestock/ integrated Farm Assurance Scheme and is considering standards for coffee and fish farming. (See Fig. 2/8).

- **British Retail Consortium (BRC)**
  
BRC has three standards – The BRC Global Standard on Food Safety and Quality (which incorporates a HACCP system); The BRC/IOP Technical Standard and Protocol for companies manufacturing and supplying food packaging materials, The BRC/FDF Technical Standard for the supply of non-genetically modified food ingredients and products. Although a degree of commonality exists between BRC and Eurep Gap the basic difference is that Eurep Gap relates to pre-farm standards whilst BRC is more relevant to post farm gate standards.

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6 The UK-based Ethical Trading Initiative is supported by supermarkets such as Tesco and NGOs like OXFAM and requires its members to apply ethical labour standards to its suppliers (growers, manufacturers etc.).
Eurepgap – the Global Partnership for Safe and Sustainable Agriculture started as an initiative by a group of experts from leading European retailers in 1997. Their aim was to establish global harmonisation of food safety and environmental standards for fruits and vegetables on a pre-competitive level. The initiative has grown rapidly. The current version of the Eurepgap document and procedures has been agreed among partners from the entire food chain for fruit and vegetables. Nowadays, 25 countries all over the world harbour local offices of provisionally approved Eurepgap Certification Bodies. These Certification Bodies issue Eurepgap Certificates to grower organisations or individual growers that apply to the standards. 120 companies and organisations have signed up for Eurepgap Term of Reference.

**EUREPGAP terms of reference**

Respond to Consumer Concerns on Food Safety, Animal Welfare, Environmental Protection and Worker Welfare by

- Encouraging adoption of commercially viable Farm Assistance Schemes, which promote the minimisation of agrochemical inputs, within Europe and worldwide
- Developing a Good Agricultural Practice (GAP) Framework for benchmarking existing Assurance Schemes and Standards including Traceability
- Providing guidance for continuous improvement and the development and understanding of best practice
- Establishing a single, recognised framework for independent verification
- Communicating and consulting openly with consumers and key partners, including producers, exporters and importers

Www.eurep.org

- **MPS**
  The Milieu Programma Sierteelt is a Dutch initiative covering flowers and is very much concerned with ensuring Good Practice concerning pesticide use and residues. MPS has a particularly active organisation in Africa that provides on-site advice and training to growers.

- **Grain and Feed Association (GAFTA)**
  GAFTA has established a worldwide COP for the shipping and transport of grain and additionally provides over 80 standard forms of contracts dealing with the major part of trade verification, examination and quality control in transit.

- **Europam**
  This is the body that lays down GAP guidelines for the growing and primary processing of medicinal and aromatic (culinary) herbs and related plants and materials used in the food, food flavouring and perfume industries. Its COP requires traceability back from the trader to the initial seed propagator.
European Spice Association (ESA)

ESA has produced a COP that covers the quality minimum for imported herbs and spices. ESA specifications particularly address the EU legal requirements in many areas for pesticide residues, aflatoxins, trace metals and microbiological contaminants.

All these bodies to varying degrees are involved in assisting developing country exporters through training and advice on how to achieve compliance with the COP requirements. In addition, bodies like COLEACP, FAO have specific schemes of financial and technological assistance available for the implementation of firm specific projects designed to meet the requirements of EU legislation generally and COPs specifically. Examples of the type of assistance are provided later in this study.
3 Major areas of impact

Tariff-related aspects: When examining the impact of SPS requirements on ACP/EU trade it is useful to note the market context within which this is taking place. Over 95% of ACP exports to the EU are duty free - this rises to nearly 100% for Least Developed countries (LDCs) that come under the Everything But Arms (EBA) initiative. Progressive reductions in EU’s import duty (and other restrictions such as quotas) levied against products from developing countries in Asia and Latin America has meant a general erosion of ACP exporters preferential edge for some competitive products including traditional crops such as bananas and some processed foodstuffs. CAC countries (this includes Central America, Colombia, Venezuela, Bolivia, Peru) receive duty free preference on a range of industrial products and GSP coverage for some agricultural including processed products.

The increased tariff preferences given to GSP countries in recent reviews and bilateral preferences e.g. for South Africa and Mediterranean markets and the EBA scheme have further reduced the relative ACP preference. Because of tariff escalation, LDCs exports of processed goods continue to benefit from the greatest margins relative to their more developed competitors although the relative level of benefit continues to decline as the level of duty progressive declines for their competitors in Latin America and Asia.

Usage of preferences: However, the availability of the preference to LDCs and their actual impact on trade are two different issues. None of the top six users of Lomé/Cotonou preferences is an LDC and only one is landlocked (LL). In contrast, some of the least users of the available preferences are Chad (LDC/LL), Liberia (LDC), Niger (LDC/LL) and Central African Republic (LDC/LL). For these countries, the problems of exporting to the EU are greater than purely those relating to tariff preferences or SPS requirements and are more symptomatic of their prevailing economic political and infrastructural conditions together with the shortage of exportable product.

These countries have few direct transportation links with the EU and this coupled with their unfavourable domestic environment and lack of experience with export documentation generally, constitute barriers which have to be overcome before the question of SPS compliance becomes particularly relevant.

Doha Round: These market access issues formed a fundamental background to the Doha Round (4th WTO Ministerial Conference), which focused on the trade barriers originating from developed countries. Prominent among these were the increasing level of health and safety requirements and the difficulty developing countries have in meeting them. Discussions covered inter alia the application in practice of the equivalence rule of the SPS Agreement and the extent to which developed countries observed the “special and differential” provision of the Agreement [Art. 9 and 10(2)]

7 The Usage of the EU Trade Preferences (GSP and Lomé) 2000
Although these discussions and agreements to “do better in future” may in general terms improve the general environment for ACP countries it remains to be seen the actual degree of impact they will have on trade relations between the EU and ACP countries. Of more immediate usefulness has been the progress in establishing more sources of funds and particularly important, the realisation that a need exists to co-ordinate and target the widespread activities of the existing bodies providing technical assistance in all its forms. (See Technical Assistance - Section 5). The following provides an indication of where additional funds and activities may be most usefully targeted in terms of countries and product areas at risk from EU SPS measures.

3.1 ACP exports to the EU

ACP exports to the EU in 2001 totalled approximately Euro 32 Billion. Approximately 45% of this is accounted for by three commodities - oil, gold and diamonds and 30% by various non-edible manufactured goods. This leaves approximately 25% or €7bn by value, which falls under the general heading of Agricultural food exports. This is the area where SPS measures in all their forms have relevance. Annex C provides details of individual ACP countries’ exports to the EU. These have been arranged into four broad categories covering nine product sub heads, which largely correspond to the impact areas of the various SPS regulations.

For the purpose of further analysis, a more detailed product breakdown of ACP/ EU exports is provided at Fig. 3/1. This omits products that, although of agricultural origin, are of low priority in the SPS debate e.g. live animals, tobacco, oilseeds, “unspecified products” of animal or vegetable origin.

The table therefore shows the range of products which, to varying degrees, are impacted by SPS regulations. The principal suppliers of each product are identified where these account for meaningful quantities. The countries are arranged in ascending order of importance i.e. lowest first.

3.1.1 Principal suppliers to the EU

Fig 3/2 shows that of the suppliers shown in Fig 3/1, 17 account for approximately 83% of these products and are an indicator of which ACP countries are most likely to be affected by the costs of SPS requirements.
Fig. 3/1: ACP Agricultural and food exports to the EU and principal country suppliers 2001 (€ 000s)

<table>
<thead>
<tr>
<th>Major Product Category likely to be affected by SPS</th>
<th>Value of ACP agri exports to EU</th>
<th>Percentage of total ACP agri exports to EU</th>
<th>Principal Suppliers in ascending order &lt;smallest–highest&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>HS 02 Meat &amp; edible meat offal (incl. up to frozen &amp; inc. of poultry, and rabbits)</td>
<td>€136,385</td>
<td>1.94%</td>
<td>Belize, Zimbabwe, Namibia, Botswana</td>
</tr>
<tr>
<td>HS 03 Fish etc up to and including frozen and dried</td>
<td>€1,302,602</td>
<td>18.5%</td>
<td>Bahamas/ Kenya, Angola, Nigeria, Uganda, Mozambique, Madagascar, Mauritania, Tanzania, Senegal, Namibia</td>
</tr>
<tr>
<td>HS 06 Cut flowers including trees and live plants</td>
<td>€339,242</td>
<td>4.8%</td>
<td>Ivory Coast, RWanda, Tanzania, Zambia/ Uganda, Zimbabwe, Kenya</td>
</tr>
<tr>
<td>HS 07 Edible vgs incl. roots and tubers</td>
<td>€241,034</td>
<td>3.4%</td>
<td>Ethiopia, Senegal/ Zambig, Zimbabwe, Kenya</td>
</tr>
<tr>
<td>HS 08 Edible fruit and nuts, peels etc</td>
<td>€786,514</td>
<td>11.2%</td>
<td>St Lucia/ Kenya, Belize, Zimbabwe, Jamaica, Ghana, Madagascar, Dom. Rep., Cameroon, Ivory Coast</td>
</tr>
<tr>
<td>HS 09 Coffee, Tea and spices</td>
<td>€900,914</td>
<td>12.8%</td>
<td>Zimbabwe, Malawi, Tanzania, Cameroon, PNG, Madagascar, Ethiopia, Ivory Coast, Kenya</td>
</tr>
<tr>
<td>HS 10/11 Cereals/ Flour</td>
<td>€45,159</td>
<td>0.6%</td>
<td>Guyana</td>
</tr>
<tr>
<td>HS 15 Oils of animals, vegetables, fats inc margarine</td>
<td>€223,998</td>
<td>3.18%</td>
<td>Ivory Coast, Sudan, Senegal, Papua New Guinea</td>
</tr>
<tr>
<td>HS 16 Preparations of meat/fish beyond frozen and dried</td>
<td>€492,496</td>
<td>7.0%</td>
<td>Papua New Guinea, Kenya, Madagascar, Senegal, Mauritius, Ghana, Ivory Coast, Seychelles</td>
</tr>
<tr>
<td>HS 17 Sugar and sugar confectionery</td>
<td>€881,791</td>
<td>12.5%</td>
<td>Belize, Malawi, Barbados/ Trinidad/ Tobago, Zimbabwe, Jamaica, Swaziland, Fiji, Guyana, Mauritius</td>
</tr>
<tr>
<td>HS 18 Cocoa &amp; cocoa confectionery</td>
<td>€1,687,289</td>
<td>23.9%</td>
<td>PNG, Dom. Rep, Cameroon, Nigeria, Ghana, Ivory Coast</td>
</tr>
<tr>
<td>Totals</td>
<td>€7,037,424</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note:
(i) Figures exclude South Africa. Total covers food agricultural products likely to be affected by SPS measures [tobacco, products made of vegetable goods (matting), waters, alcoholic drinks etc are excluded]
(ii) Where exports are similar, countries are grouped jointly e.g. Bahamas/ Kenya

Source: Based on EU Trade Statistics/ Eurostats
### Fig. 3/2: Top ACP suppliers of agricultural (excluding non-food) products to the EU

<table>
<thead>
<tr>
<th>Country</th>
<th>(a) Total agri exports by country (€)</th>
<th>(b) Total agri and industrial exports (€)</th>
<th>(c) Agri products (i) as % of country’s total exports i.e. (a) as % of (b)</th>
<th>(d) % of total ACP agri exports (€)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ivory Coast</td>
<td>1,449,685</td>
<td>2,057,348</td>
<td>70.5</td>
<td>20.6</td>
</tr>
<tr>
<td>Kenya</td>
<td>663,136</td>
<td>924,248</td>
<td>71.7</td>
<td>9.42</td>
</tr>
<tr>
<td>Ghana</td>
<td>446,423</td>
<td>1,069,195</td>
<td>41.7</td>
<td>6.3</td>
</tr>
<tr>
<td>Cameroon</td>
<td>376,717</td>
<td>1,735,320</td>
<td>21.7</td>
<td>5.3</td>
</tr>
<tr>
<td>Mauritius</td>
<td>373,493</td>
<td>1,288,709</td>
<td>30.0</td>
<td>5.3</td>
</tr>
<tr>
<td>Namibia</td>
<td>355,114</td>
<td>884,247</td>
<td>40.2</td>
<td>5.0</td>
</tr>
<tr>
<td>Senegal</td>
<td>307,293</td>
<td>451,273</td>
<td>68.0</td>
<td>4.4</td>
</tr>
<tr>
<td>Nigeria</td>
<td>283,155</td>
<td>6,458,201</td>
<td>4.4</td>
<td>4.0</td>
</tr>
<tr>
<td>Madagascar</td>
<td>247,197</td>
<td>601,736</td>
<td>41.1</td>
<td>3.5</td>
</tr>
<tr>
<td>Zimbabwe</td>
<td>214,893</td>
<td>783,260</td>
<td>27.4</td>
<td>3.1</td>
</tr>
<tr>
<td>Tanzania</td>
<td>203,932</td>
<td>408,444</td>
<td>49.9</td>
<td>2.9</td>
</tr>
<tr>
<td>PNG</td>
<td>193,800</td>
<td>284,978</td>
<td>68.0</td>
<td>2.8</td>
</tr>
<tr>
<td>Uganda</td>
<td>183,927</td>
<td>249,580</td>
<td>73.7</td>
<td>2.6</td>
</tr>
<tr>
<td>Seychelles</td>
<td>177,005</td>
<td>192,467</td>
<td>92.0</td>
<td>2.5</td>
</tr>
<tr>
<td>Guyana</td>
<td>137,352</td>
<td>204,361</td>
<td>67.2</td>
<td>2.0</td>
</tr>
<tr>
<td>Jamaica</td>
<td>130,534</td>
<td>570,809</td>
<td>22.9</td>
<td>1.9</td>
</tr>
<tr>
<td>Mauritania</td>
<td>122,018</td>
<td>375,532</td>
<td>32.5</td>
<td>1.7</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>5,865,674</strong></td>
<td><strong>18,335,347</strong></td>
<td><strong>32.0</strong></td>
<td><strong>83.3</strong></td>
</tr>
</tbody>
</table>

*Figure equals exports from selected 17 countries as percentage of total ACP food agri exports (€7,037,424) as defined in Fig. 3/1*

**Source:** Eurostats 2001

### 3.1.2 Principal countries impacted

Impact is wider than just export value/volumes. The impact of SPS measures on individual countries cannot however be assessed purely based on the volume or value of their exports. Other factors, such as the relative importance of this particular sector in the country’s overall export earnings must also be considered. Nigeria, for example, can be viewed as a major exporter of agricultural produce but account has to be taken that its main export earnings are oil related. Consequently, the impact of SPS measures when viewed from a
Thereby, the macroeconomic viewpoint will be less than might at first be apparent. This is also the case for other countries where service industries, such as tourism make up the bulk of a country’s GDP.

Looking in more detail at ACP countries, Malawi and Zimbabwe traditionally have tobacco as their major exports whilst Zambia and other Central African states export considerable amounts of minerals. Agriculture and foodstuffs are a very low percentage of exports from Equatorial Guinea, Trinidad and Tobago, Gabon and Liberia. The most developed countries are stronger in the processed foodstuffs sector. Some countries have a wider representative range of products – Mauritius, Cameroon, Ivory Coast, Madagascar and Papua New Guinea.

In some of these, e.g. Ghana, Ivory Coast, not only is the product major in terms of volume of export, but can also be very important from the point of view of employment. Cocoa growing in West Africa is extremely important for people with no alternative form of employment and working as out-croppers supplying cocoa to major export groups.

Single crop dependency: Some countries are also heavily dependent on a single crop for their exports to the EU – for example, fish (to frozen and dried) make up about one third of Namibia’s total exports to the EU, about 40% of both Senegal’s and of Bahamas’, and about 25% of exports from Mauritania and Tanzania. Fruit and vegetables account for about 50% of exports from Haiti, Gambia, Ethiopia, and PNG, a third from Uganda and 65% from Rwanda. Sugar and sugar confectionery account for about 90% of exports to the EU from Fiji and about 65% of Swaziland and 80% from St Kitts & Nevis.

An obvious example of dependency is bananas (particularly from the Caribbean) but it is clear that trade in this commodity is firmly in the hands of a limited number of large multinationals who are well able to absorb any additional SPS related costs. Bananas have, therefore, been excluded from the study’s attempt to identify which countries and products are principally affected by SPS measures.

Most impacted: Looking further at the countries and products it is possible to identify 36 countries that it is considered are likely to be most impacted by SPS measures. The criterion for such judgement must necessarily be somewhat subjective in the absence of the much wider econometric study that would be needed to supply more substantive indicators. For the purposes of this study the countries and products have been selected based on two criteria:

- Products that represent a large percentage of a country’s exports (which has been assumed at in excess of 30-40%) irrespective of whether the actual value is small relative to other ACP exporting countries.

- Products that represent only a small percentage of a country’s exports (which has been assumed at less than 5%) but which in themselves are large in value terms relative to other ACP exporting countries.
Fig. 3/3 shows the result of this analysis in terms of eight of the nine product heads covered in Annex C. The head “Live Animals” has been omitted, as the ACP/EU trade is not seen to be sufficiently important for any country in terms of the possible additional SPS related cost impact.

3.1.3 Impact on GDP and employment

With the exception of those countries whose service sector is the primary employer (e.g. Bahamas 90%, Barbados 75%, Jamaica 60%, Marshall Islands 58%), it is true to say that the agricultural sector is by far the biggest employer in the ACP. The sector’s importance in employment terms is not however, reflected to the same degree in terms of its contribution to countries’ GDP.

Annex E provides a breakdown of ACP countries by GDP and employment component of the three economic sector descriptions for which broadly comparable data is available. Each country rating within the UN Human Development Index (HDI) is also provided as a general indicator of the possible impact of additional SPS costs i.e. a richer country is more likely to be in a better position to absorb SPS compliance costs than a poorer one.

It is necessary to approach these figures with some caution because of differences in statistical presentation between countries. In some instances, “food processing” is classed under agriculture whilst in others it has been regarded as part of the industrial sector. Some discrepancies also exist where a large public sector exists which encompasses all three categories of activity and some agricultural and industrial workers have been classified within the Service sector (as part of government service).

Nevertheless, it is possible to obtain some indication of where the burden of SPS costs may fall. Two approaches to this have been adopted: one to identify countries where agriculture contributes 50% or more to GDP and two, to identify countries where employment in the agricultural sector is in excess of 60% of total employment.

The results of this are detailed in Figs 3/4 and 3/5 and it is interesting to note that whereas the agricultural sector in only nine countries accounts for 50% or more of GDP the same sector in fifty countries accounts for over 60% of total employment. A comparison of the two lists shows six countries being common to both – Ethiopia (GDP 52%, employment 80%), Liberia (GDP 60%, employment 70%) Guinea-Bissau (GDP 54%, employment 82%) Somalia (GDP 65%, employment 71%) Micronesia (GDP 50%, employment 70%) Congo RDC (GDP 64%, employment 65%).
<table>
<thead>
<tr>
<th>Country</th>
<th>Product</th>
<th>Meat &amp; meat offal</th>
<th>Fish to dried and chilled</th>
<th>Fruit &amp; vegetables</th>
<th>Flowers</th>
<th>Meat/ fish preparations</th>
<th>Sugar/ Sugar confectionery</th>
<th>Cocoa/ cocoa confectionery</th>
<th>Cereal preparations</th>
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<tbody>
<tr>
<td>Bahamas</td>
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<td>X</td>
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<td>Barbados</td>
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<td>Botswana</td>
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<td>Cameroon</td>
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*Source: Cenex Ltd 2008*
Fig. 3/4: Countries whose agricultural sector accounts for over 50% of GDP

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<th>Country</th>
<th>% GDP</th>
<th>% Sectoral employment</th>
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<td>Chad</td>
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Fig. 3/5: Countries whose agricultural sector accounts for over 60% of total employment

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<th>Country</th>
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<th>Percentage</th>
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</table>

3.2 Indicators of problem areas

3.2.1 Problems with specific products

One useful indicator of SPS impact can be found in the European Commissions Rapid Alert System of Food and Feed (RASFF). Whilst data is not readily available for the ACP countries in isolation the general pattern of Alerts and Notifications in respect of suspected contamination or other health risk provides some indication of where problems are arising.

Figs 3/6 and 3/7 show the categories of products notified during 2002 under two heads. “Alert Notifications” (Fig. 3/6) which indicates that a product which is already on the EU market represents a health risk and “Information Notifications” (Fig. 3/7) which indicates that, although a product is not on the EU market it is considered a health risk and as it may be available elsewhere some preventive action is required to ensure that it does not enter the EU.

**Fig. 3/6: Categories of products notified in 2002 as alert notifications**

![Diagram showing categories of products notified as alert notifications]

**Source:** Produced by Cerrex Ltd on the basis of information supplied by the EU Commission

The difference between the causes of the problems in different products is highly relevant to the examination of SPS impact. It is claimed that it is easier and therefore usually less costly to reduce the extent of microbiological than chemical problems. Microbiological problems are mainly related to non-appropriate hygiene while chemical reasons are related to the use of particular technologies (e.g. pressing oil from nuts), which are costly to change.
Fig. 3/7: Categories of products notified in 2002 as information notifications

Source: Produced by Cerrex Ltd on the basis of information supplied by the EU Commission

Fig. 3/8 details notifications during 2002 by source of contamination. This shows that of the 1528 notifications 33% were chemical related with microbiological accounting for 20%. Africa is widely viewed as being responsible for an increasing share of chemical notifications.

Fig. 3/8: Notifications according to categories of source of contamination in 2002

<table>
<thead>
<tr>
<th>Category</th>
<th>Total</th>
<th>Alert</th>
<th>Non-alert</th>
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<tbody>
<tr>
<td>Chemical</td>
<td>510</td>
<td>130</td>
<td>380</td>
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<tr>
<td>Veterinary drug residues</td>
<td>445</td>
<td>90</td>
<td>356</td>
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<tr>
<td>Microbiological</td>
<td>307</td>
<td>132</td>
<td>175</td>
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<tr>
<td>Pesticide residues</td>
<td>172</td>
<td>43</td>
<td>129</td>
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<tr>
<td>Not determined</td>
<td>24</td>
<td>17</td>
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<tr>
<td>Parasites</td>
<td>19</td>
<td>1</td>
<td>18</td>
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<tr>
<td>Adverse effects</td>
<td>15</td>
<td>5</td>
<td>10</td>
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<tr>
<td>Foreign bodies</td>
<td>14</td>
<td>11</td>
<td>3</td>
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<tr>
<td>Labelling</td>
<td>11</td>
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<tr>
<td>Radiation</td>
<td>3</td>
<td>0</td>
<td>3</td>
</tr>
<tr>
<td>Organoleptic changes</td>
<td>2</td>
<td>2</td>
<td>0</td>
</tr>
<tr>
<td>Adulteration</td>
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<td>0</td>
</tr>
<tr>
<td>Total</td>
<td>1528</td>
<td>433</td>
<td>1095</td>
</tr>
</tbody>
</table>

Note: A notification might contain more than one source of contamination

Source: EC RASFF 2002
It is interesting to note that the problem with fish (the largest category) seems to be mostly microbiological (salmonella) although a rising trend of chemical problems is becoming noticeable. Chemical problems seem mostly to apply to fruit and vegetables (83% in 2001) coffee and tea (79%), fats and oils (100%) and nuts (96%). Microbiological problems are mostly related to meat, fish and dairy products.

3.3 Major sources of problems

Whilst all SPS legislation impacts on all ACP countries it is clear that some requirements have greater significance than others and some are of special significance to particular agricultural sub sectors, three of these requirements are reviewed.

3.3.1 Traceability

Recent legislative changes that the EU has introduced relating to the Traceability Regulation (178/2002) have potentially adverse consequences for developing country exporters. This legislation effectively now places the onus of proof on the private sector and lays the heads of enterprises from both the EU production and import sectors open to criminal sanctions. If such bodies are unable to prove that they have taken all possible precautions to avoid contamination of fruit and vegetables sold to EU consumers, they can be fined around €40,000 per consignment and possible imprisonment for up to two years.

This threat is resulting in the major organisations involved in European distribution (covering an average of 80% of fresh fruit and vegetables) placing increased pressure on their suppliers to provide all guarantees of traceability and food safety for fresh fruit and vegetables. The typical small ACP exporter is not equipped to supply the amount of information required and consequently there is a high risk of trading links between the various players in the ACP/ EU horticultural sector being severed.

Each of the industry’s interdependent parts of the supply chain is affected by the consequence of the changes to EU MRL requirements. These impacts start where ACP fruit and vegetables imported into the EU cannot demonstrate conformity to food safety requirements.

Discussions during the study with COLEACP\(^8\) indicate that the groups economically affected throughout the supply chain are:

- Distributors who, in order to avoid accusations of contravening the regulations protecting the health of their consumers/clients will refuse to obtain supplies from importers who cannot guarantee the traceability and food safety of consignments.

\(^8\) In particular officials responsible for the Pesticides Initiative Programme (PIP)
• Importers who, in order to demonstrate that they have taken all possible precautions in terms of food safety, will demand that exporters adopt “good practice” from the field to the point of embarkation – to be certified by independent organisations.

• Exporters, who, in order to prove the traceability and food safety of consignments for export, will limit supplies from producers who cannot adopt conforming agricultural practices.

3.3.2 Harmonisation of import procedures

The harmonisation of EU national standards (Decision 2001/4 and preceding) led to conformity in EU assessment procedures, which have had particular impact on exporters in the fish sector. At present country exporters of fish products intended for human consumption are divided into two groups – those on List 1 (Fig 3/9) and those on List 2 (Fig. 3/10). Those on List 1 are authorised to export their produce for circulation freely throughout the EU single market. Those on list 2 are restricted to exporting to specific countries and usually reflect a traditional pattern of trade (e.g. ex colonial) or supply for a particular ethnic minority in a member state.

Fig. 3/9: List of countries from which importation of fishery products in any form intended for human consumption is authorised

<table>
<thead>
<tr>
<th>List 1</th>
</tr>
</thead>
<tbody>
<tr>
<td>Includes: Ivory Coast, Ghana, Gambia, Jamaica, Madagascar, Mauritania, Mauritius, Namibia, Nigeria, Seychelles, Senegal, Tanzania, Uganda</td>
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</table>

Fig. 3/10: List of countries meeting the terms of Article 2(2) of Council Decision 95/408/EC

<table>
<thead>
<tr>
<th>List 2</th>
</tr>
</thead>
<tbody>
<tr>
<td>Includes: Antigua and Barbuda, Angola, Belize, Benin, Republic of Congo, Cameroon, Eritrea, Fiji, Gabon, Grenada, Kenya, Mozambique, Papua New Guinea, Suriname, Togo, Zimbabwe</td>
</tr>
</tbody>
</table>

The Commission has tried on several occasions in recent years to abolish List 2 so as to harmonise all EU import requirements. The latest position is that the national arrangements reflected in List 2 will cease from the end of 2003.

Prior approval: Under this all exporters of fish and fish products to the EU will become subject to a common system of prior approval. To achieve this a competent authority in their home country must certify that they comply with sanitary standards that are at least equivalent to those of the EU. (Fig. 3/11 shows this procedure). In addition, individual product consignments may need to be certified and/or by subject to inspection at the EU
border. This multi-tiered system of conformity assessment potentially imposes significant costs on exporters of fish to the EU. Countries that currently only satisfy list B requirements will undoubtedly find the new arrangements affecting their ability to export.

Livelihood in fishing: Much of ACP employment and economic livelihood is dependent on either inland or marine fisheries. The vast majority of employees are artisanal and to a large extent the handling, processing and freezing facilities are greatly in need of modernisation. The SPS regulations have created, in many instances, a realisation that unless upgrading occurs then much of the EU export market, which has been developed in recent years, will be barred to developing country exports.

An example of the impact of this requirement is the Tobago fishing industry, which lost an important part of its market for frozen fish. The majority of Tobago fish is landed fresh or chilled and thereafter is sold for domestic or East Caribbean consumption (or the USA, which takes 2-3 hours flying time and can therefore be sold fresh). Fish to the EU has to be sold frozen. The system of ensuring adherence to standards by overseas suppliers differs between these two ACP export markets. Tobago exporters would prefer to see USA and EU mutual acceptance in this area.

The origin of the problem for Tobago and other countries stems (in part) from the fact that the EU does not grant authorisation for exports to individual companies but gives “accreditation” to local Competent Authority with the task of ensuring compliance with the EU health standards. According to a survey of Tobago in 2000, the EU authorities have been unwilling to authorise such a body on the grounds that Tobago lacks the necessary facilities to meet the freezing and other health standards required. Similar problems existed in other countries where fish is an important export e.g. in Mozambique.

3.3.3 Reducing permissible maximum residual levels (MRLS)

The latest EU legislation (2000/29/EEC) lowers the limits of pesticide residues permitted to remain on imported produce.

A report to the UK Tropical Agriculture Association considered that due to poor communications and a lack of understanding of the real consequences of the changes, insufficient work has been done to support the setting of MRLs for imported tropical and sub tropical crops.

While they may be very significant to producers and even the economies of some producing countries, many of them (e.g. pineapples, mangoes, avocados etc.) have not attracted the attention of the chemical manufacturers as their potential return on the investment required for trial work (for improvement or alternatives) is not commercially attractive.

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9 The Usage of the EU Trade Preference (GSP and Lomé) 2000
10 “Recent Developments in EU Pesticide Regulations and their Impact on Imports of Tropical Fresh Produce" 2001
The result has been that MRLs have been set, by default at LOD (the limit of detection) for a wide range of these crops. This closing off has led to the reluctance of the EU retail sector (notably in the UK) to accept products that have been treated with pesticides that have been so closed off. This situation has become particularly serious for post harvest fungicide treatments, which are essential when sea freight is used for exports and where residues are most likely to remain on the surface of the product up to the point of retail.

A related impact study was carried out by the National Research Institute (UK) to identify the effects of these changes in regulations on developing countries. The report concluded
that, in the ACP countries, some 45m people were dependent on horticultural exports to the EU for their livelihood and legislative changes were likely to have effects as follows:

- A fall in export production and increased production costs
- Higher risk of crop wastage and crop failure
- Exclusion of small growers from the supply chain
- Exclusion of smaller countries from the export chain

Smallholders were most affected because:

- Importers will exclude exporters relying on small outgrowers
- Exporters will not source from smallholders where alternative sources exist
- Production costs will increase (more expensive chemicals and controls)
- Smallholders may turn to local markets/subsistence as an alternative

Workers would suffer through:

- Loss of jobs, especially in SMEs
- Increased seasonality of work and reduced job security
- Reduced income
- Social disruption

Developments in this area were one of the primary drivers behind the establishment of the COLEACP Pesticides Initiative Programme (PIP) to help exporters to comply with the new regulations. Some of the ongoing work of the PIP is covered later in this study. (Section 5).
4 Compliance costs of meeting SPS measures imposed on countries’ infrastructure

4.1 Major institutional deficiencies

The increased threshold of food safety required by EU importers/consumers also requires an increase in the domestic capacity of exporting countries to meet the various requirements. Whilst some ACP countries have undoubtedly been successful in introducing well-designed and functioning food quality assurance and control systems, these are the exception rather than the rule.

The study reviewed a range of reports and sector representations and identified a number of areas of deficiency that appear to have a commonality across the ACP bloc. Each in its own right represents an infrastructural hindrance to exporters’ practical ability to meet SPS requirements. Their existence collectively in a country may go some way to explain why some countries’ exports remain static and/or confined to traditional market sectors and supply channels. If information about the regulations to be met is difficult to access and official support non-existent there is obviously little incentive to develop new product lines.

- **Access to compliance resources**
  This is a major problem and includes information on SPS standards themselves, scientific and technical expertise, skilled labour and loan finance at a commercially viable interest rate.

- **Compliance period**
  The period allowed for compliance directly influences the costs of compliance. In many cases, developing countries require longer to comply than developed countries allow. This is in part due to the problems involved in accessing compliance resources. Failure to comply within the specified time frame may result in lost exports initially and possible forfeiture of market share to the long-term detriment of the country’s export earnings.

- **Access to information**
  Although in some ACP countries there is good information about the SPS requirements in EU markets, in others obtaining up to date technical data from official sources may be more difficult. The study came across references to exporters and sectoral organisations identifying the Notifications Procedures of the SPS Agreement as the only reliable source of information.
• **Awareness**
The level of awareness and understanding of SPS measures in general and the SPS Agreement in particular is generally considered to be low, this is likely to be related to the problems involved in accessing information.

• **Internal regulatory structures**
The extent and nature of existing domestic regulatory structures for SPS issues in developing countries affects their ability to comply with standards in the EU. The existence of domestic SPS standards better equips firms to understand the need to comply with EU requirements. Public authorities should also find it easier to implement conformity assessment procedures on behalf of the ACP countries given they have an existing structure. It is likely that those countries having most problems with EU SPS measures are those with least developed SPS domestic infrastructure.

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**Fig. 4/19: Vanuatu**

The Republic of Vanuatu has delegated specific government agencies responsible for addressing consumer food safety (e.g. Department of Public Health; Quarantine and Inspection Services) who authorised to implement necessary procedures through existing food legislation.

These government agencies collectively form the Vanuatu National Codex Committee (est. 2000) introducing Codex Standards as a guideline to overseeing national food issues.

Financial difficulties, a lack of qualified human resources and inadequate testing facilities have been identified as obstacles to the achievement of food safety contributing to a lack of available data on borne illnesses in Vanuatu.

Source: FAO/WHO

4.1.1 ‘The menu of needs’

It is generally true to say that the food control systems in most developing countries suffer from a number of weaknesses that make them ineffective in ensuring consumers’ protection and deprive the countries from taking full advantage of the potential represented by the EU marketplace. A recent FAO working paper\(^\text{11}\) summarised these weaknesses, which concern all the basic elements required to establish a viable national food control system. These are detailed below in the form of a “needs menu”, the individual elements of which are

\[^{11}\text{Building Capacity for Biotechnology, Food Quality and Safety and Phyto and Zoosanitary Standards – An Integrated Programme.}\]
applicable to individual countries to differing extents:

- **The need for a national food control strategy**
  Food control necessarily involves collaboration between government agencies, the food industry itself, consumers and academic/research institutions. Quality and safety of food have to be addressed throughout the food production, processing, storage and distribution chain, which involves all these participants. To achieve this governments need assistance to produce a National Strategy that clearly lays down the role of government agencies, the food industry and consumers and establishes mechanisms for co-operation and the means of dealing with existing or emerging food safety and quality challenges.

- **The need for functioning food laws and regulations**
  Food laws, standards and regulations are often obsolete, incomplete or unenforced. An effective food control system needs to be founded on up-to-date regulatory requirements reflecting the needs of the commercial marketplace.

- **The need for food inspection services**
  The different administrations involved often have poorly defined duties and also lack the manpower and/or technical expertise to carry out food inspection and compliance duties. An efficient and properly staffed inspection service is a prerequisite for the enforcement of regulatory requirements. Deficiencies at this level of infrastructural support are a major reason for erosion of confidence by EU importers in exporters’ domestic-based certification procedures.

- **The need to upgrade food control laboratories**
  Laboratories are generally inadequate in terms of physical structure, equipment, supplies and technical personnel. To be effective and to fully meet the increasing technology driven scope of regulatory requirements, food control analytical services have to be carried out by trained personnel using up-to-date equipment and analytical procedures. Lack of resources from government has meant that even where good laboratories exist their effectiveness has declined due to their inability to keep pace with technological advances in instrumentation and analytical techniques.

- **The need to enhance scientific and technical expertise**
  Advances in technology are leading to increasingly stringent safety requirements reflecting regulators’ ability to detect ever lower levels of additives, residues etc. The development of improved risk assessment capacity by ACP countries is extremely important if exporting countries are to be able to challenge the scientific basis for the introduction of new or precautionary EU regulations.
Fig. 4/20: Case study

Infrastructure problem in Kenya

Responsibilities in Kenya for notification and handling of enquiries of sanitary and phytosanitary measures are split among different authorities. The Ministry of Trade has been designated as the responsible National Notification Authority (NA) while the Enquiry Point (EP) is being operated by three different authorities. Two divisions in the Ministry of Agriculture share responsibilities for plant health and animal health. The responsibility for human health is with the Ministry of Health.

This multiplicity of responsibilities can lead to adverse consequences for Kenyan exporters. A particular example relates to the European notifications of import restrictions for fish from Lake Victoria (1997 and 1999), which put Kenya into a difficult situation. The EU justified the import ban through concerns about hygiene standards in the supply chain and later on through special food safety problems (cholera, fishing with pesticides). The Ministry of Health being responsible for human health was only partly in a position to react lacking competence in fisheries. Competent authority within the Ministry of Agriculture did not exist at that time although a special fisheries department has since been created. Due to such scattered responsibilities, Kenya failed to react in time (the period for comments is 60 days) so the European import ban came into operation. Restriction based on concerns about cholera outbreaks and fishing with pesticides was highly contested but Kenya was not in a position to prove the safety of its fish due to the lack of accredited laboratories.

Source: KEPHIS

4.2 Costs of capacity building

The precise additional SPS related costs of introducing new infrastructure and/or upgrading existing facilities for the ACP bloc is virtually impossible to measure. Countries are at different starting points on the measurement scale and some of the activities related to satisfying SPS requirements would have had to be implemented in any event.

The question of who is actually bearing the cost is also relevant in looking at the overall impact on exporting countries. A considerable programme of financial and technical assistance from bodies like the World Bank, FAO, EU exists that significantly mitigates the burden on government exchequers. It must be pointed out that expenditure on upgrading confidence enhancing facilities in exporting countries must inevitably also have some quantifiable benefits in the form of increased exports and revenue earnings as well as social welfare.

Nevertheless, whilst it is not possible to identify the specific costs to be attached to the SPS related needs of individual ACP states it is possible to identify a Menu of Costs. This menu is composed of indicative costs of various activities needed to meet the Menu of Needs outlined in section 4 and draws on the work of the FAO. From this it is possible to say that all ACP countries will at some time and to some extent incur all or some of the costs indicated directly as a result of their need to meet SPS based requirements.
Pressure to introduce the necessary measures may come from EU official legislation and/or private sector Codes of Practice. In some instances, pressure will be for the establishment of regional facilities (testing laboratories, certification bodies etc.). This is particularly the case in the Pacific region where the economic size, geography and trade pattern of many of the island communities makes any other solution impractical.

4.2.1 'The menu of costs’

The costs shown are based on a variety of activities aimed at a number of objectives. The costs and activities largely assume the pre-existence of some degree of legislative control infrastructure, which only requires upgrading. The actual cost attributable to any particular country will naturally reflect the extent to which any particular desired facility requires upgrading or an entirely new introduction.

- **Objective 1: To enhance the capability of institutions operating in the field of food quality and safety to serve as regional/sub regional reference and training centres:**
  
  Specimen activity (regional)
  
  i. Review existing capacity in various fields such as HACCP; inspection; certification; risk analysis; laboratories; analysis etc.
     - Indicative cost: 3 m/m international consultants with travel to institution US$45,000
  
  ii. Training workshops to upgrade the skills in the institutions in the areas identified in (i)
      - Indicative cost: 5 training workshops of 1 week each US$200,000
  
  iii. Provision of additional equipment to upgrade regional training and reference centres
       - Indicative cost: 5 regional training and reference centres at an average $1,200,000 per centre US$6,000,000
       Indicative total cost US$6,245,000

- **Objective 2: To strengthen the institutional framework for national food control**
  
  Specimen Activity (average per country)
  
  i. Review of national institutions and co-ordinating mechanisms and recommendations
     Indicative costs (average per country)
     - International consultant (2 m/ m) US$30,000
     - National consultant (4 m/ m) US$16,000
     - National food quality and safety workshop US$10,000
     Total US$56,000
ii. Support for capacity to design and prioritise food quality
   Indicative cost (average per country)
   - Three seminars and training workshops on risk analysis US$30,000

   **Indicative total cost**
   US$86,000

- **Objective 3: To update the legal and regulatory framework governing food quality throughout the food chain**

  **Specimen Activity**

  i. Review of national legislation and recommendations
     Indicative cost (average per country)
     - 1 international consultant (2 m/m) US$30,000
     - 1 national consultant (2 m/m) US$8,000

     **Total**
     US$38,000

  ii. Development of new food legislation
      Indicative cost: (average per country)
      - 1 international consultant (2 m/m) US$30,000
      - 1 national consultant (2 m/m) US$8,000

      **Total**
      US$38,000

      **Indicative total cost**
      US$76,000

- **Objective 4: To strengthen and rationalise food inspection services**

  **Specimen Activity**

  i. Improvement of inspection services
     Indicative cost: (average per country)
     - International consultants (6 m/m) US$90,000
     - National consultants (6 m/m) US$24,000

     **Total**
     US$114,000
ii. Training of food inspectorate trainers in modern food inspection techniques and direct training
Indicative cost: (average per country)
- 2 training of trainers courses (20 persons) US$ 80,000
- 8 training courses (20 courses) US$160,000

Total US$240,000

iii. Provision of inspection equipment and materials
Indicative cost: (average per country)
- Sampling kits, refrigeration boxes (20) US$ 50,000
- 4 equipped inspection vehicles US$200,000

Total US$250,000

Indicative total cost US$604,000

• Objective 5: To upgrade the scientific and technical capabilities of food control laboratories

Specimen Activity

i. Identification of requirements
Indicative cost: (average per country)
- International consultant (2 m/m) US$30,000

ii. Improvement of physical infrastructure to meet international requirements
Indicative cost: (average per country) US$200,000

iii. Provision, installation and operation of additional laboratory equipment
Indicative costs (average per country)
- Purchase of laboratory equipment on average for each country - 3 gas liquid chromatographs; 2 high performance liquid chromatographs; 1 atomic spectrophotometer, general laboratory appliances and reagents Estimated cost US$1,200,000

iv. On the job training of laboratory staff
Indicative cost (average per country)
- International consultants (6 m/m) US$75,000

Total indicative costs US$1,505,000

42
• **Objective 6: To train food industry quality control managers in the implementation of food quality assurance systems including HACCP**

  **Specimen Activity**
  
  Organisation of training courses (3) on GMP and HACCP
  
  Indicative cost (average per country)
  
  - 3 courses (20 persons)  
  
  **US$120,000**
  
  The activities identified in the menu of costs amount to US$2,391,000 per country plus an additional US$6,245,000 for the regional activity. These amounts only relate to the initial work required to bring countries’ infrastructure up to the standard necessary to comply with SPS requirements. To this must be added the ongoing costs of maintaining and running the facilities, which in the absence of any outside financial contributions must be borne by individual country’s exchequer. The costs would also be significantly higher where countries had no existing facilities and needed capacity building from the ground up.

  Comments made during the study’s research identified that a major problem relates to the maintenance and running of facilities such as laboratories etc., once they have been established. Funding is available for the initial programme but once this is passed the commercial environment within which testing bodies exist often prove insufficient to produce sufficient fee income to pay for continuing updates. Unless governments provide some support the situation eventually must revert to where it was prior to the initial funding programme. These circumstances obviously would damage any export sectors that might have been encouraged to emerge as a result of the availability of the new domestic testing facilities, etc.
5 Compliance costs of meeting SPS measures imposed on individual exporters

5.1 Principal problem areas

Most of the difficulties firms experience in complying with the standards, codes of practice etc resulting from the provisions of the SPS Agreements are not directly attributable to the Agreement, nor to the increasing level of concern about food safety among EU consumers. There is little intrinsic difference between the ability and incentive of similar sized firms in the EU and ACP bloc to react to the commercial demands of the market. That a difference does exist however is indisputable and gives rise to much discussion relating to the need for amendments and/or amelioration of EU food safety requirements.

These calls are misplaced as the primary cause of the private sector’s struggle to meet the increasing range of safety requirements of the market place flows from the structural deficiencies that exist within their “home” countries. The lack of information about what they have to do and the difficulty in obtaining finance from local lending institutions to do it, as well as the scarcity of technical personnel, are the problems not the actual SPS requirement itself. Some of these issues are reviewed in Section 4 of this paper.

That said there are some SPS aspects of the marketplace that are beyond the ability of exporters to remedy by themselves.

5.1.1 Inappropriate demands by retailers

Concern exists that some major retailers make inappropriate demands on growers regarding food safety. Anecdotal evidence is given concerning a major retailer reducing the level of MRLs for certain pesticides with the result that some values actually fell below the Level of Detection (LOD). This action was allegedly in response to consumer concerns but it is debatable whether the action was commensurate with the level of concern actually existing.

In another instance a company was asked to reduce the number of pesticides used by its growers from 17 to 3 or 4 in order to reduce the effect of multi agent residues; this proved complicated given the variety of different product names covering these pesticides. It was also counterproductive in environmental terms since it contradicted the EurepGap requirement of not relying on the same chemicals.
The growing influence of the major retail chains in the EU over the whole marketing chain is also presenting some exporters with problems that are not specifically related to food safety but are presented as part of the whole “package” of trading relationship with the EU importer. Within this relationship, developing countries are beginning to find that under the general umbrella of SPS requirements importers are seeking to impose closely linked social and/or environmental conditions to be met in the production chain. Having become virtually dependent on these channels for export to the EU exporters are in a weak position to challenge the validity of such “SPS plus” requirements. In many instances, the cultural, geographic and social environment within which the exporters exist makes compliance not only costly but also impractical.

5.1.2 Technological advances

Advances in technology of food analysis for microbes, additives, pesticide residues, and other foreign matter permit faster, cheaper detection of potential safety problems in foods. The sensitivity of the methods has increased to the point that pesticide residues can often be detected at the parts per billion (ppb) and in some cases parts per trillion (ppt) levels. When zero tolerances, which are established based on the ability of a test to detect parts per million (ppm) are subjected to an increase in sensitivity to ppb or ppt this may suddenly turn a “safe” product into an “unsafe” one. There is a continuing push by EU official regulations and by sector representatives to keep lowering “zero” levels of residues. This causes obvious problems and costs for exporters in installing the necessary equipment and processes necessary to confirm compliance.

5.1.3 Increasing antibiotic resistance

The spread of antibiotics globally, and the misuse of antibiotics, has led to the development of bacteria that are resistant to antibiotics and often have increased resistance to some standard food pasteurisation practices (E.Coli 0157:H7, Staphylococcus Aurens strains etc.) which are common throughout ACP countries. The existence of these and the increase in the presence of highly sensitive groups of immuno-suppressed consumers in EU countries (AIDS and Cancer patients receiving chemo or radiation therapy) increases the precautions that have to be taken in food processing. This necessarily imposes extra costs that, in some cases, may be difficult for an ACP country exporter to meet in the absence of readily available technology and/or technical personnel.

5.1.4 Access to airfreight

Small firms, particularly in the horticultural and fish sectors experience severe problems in gaining access to airfreight. Cargo flights are generally unreliable because they only fly when full and not to a timetable. Small suppliers do not have the volumes that large organisation can supply to charter entire planeloads. Smaller producers are, therefore, left to rely on space being available on scheduled airlines at a time when their produce is ready for export. This time is not always easily foreseeable and may not coincide with the availability of spare
capacity. This has been cited as a particular problem in Ghana and Kenya but is undoubtedly also the case elsewhere.

5.2 The needs of exporters

The requirements of business wishing to export to the EU are many and varied with some firm specific needs reflecting a mixture of normal commercial practice and product/process related SPS requirements. Certification of some type will always be required whether this relates to quality or safety and adequate financial credit and technical support is a prerequisite of trade irrespective of any health and safety requirements.

This makes it difficult to isolate those needs that are solely related to SPS requirements. In many cases, it is the degree to which the SPS requirements increase the level of resources needed over and above that which would in other circumstances be needed. Thus the impact of SPS measures is not that firms need technical personnel, particular equipment or training but that they increasingly need to spend more on such areas then their normal production processes previously required.

The SPS related needs of firms operating in different product sectors and economic environments differ. Nevertheless, it is possible to identify a number of areas in which all firms at some time will have to expend resources over and above their "normal" production/export costs. These are set out in a “menu of needs”, which is intended to be illustrative rather than definitive.

5.2.1 ‘Menu of needs’

- The need for HACCP

Although HACCP began as a voluntary Quality Management System (QMS) in the 1960s, it has increasingly become an important tool in the official and private sector requirements in relation to food safety. The EU adopted HACCP principles for meat products in 1992 and for all foodstuffs in 1993 along with Codex. The recent 2002 revision of EU hygiene legislation has given further impetus to HACCP and it has now become a preferred instrument of SPS policy by public and private organisations.

The benefits of HACCP are mainly maintenance of market access to areas like the EU where HACCP is already mandatory. Caswell and Wang\textsuperscript{12} suggest that where a country has a large seafood export sector; HACCP can be instrumental in enhancing the export potential to a significant extent. Some reports\textsuperscript{13} also indicate that because of the introduction of stricter quality control management the costs related to rejection and spoilage had declined significantly.

\textsuperscript{12} The Effect of Stricter Foreign Regulations on Food Safety 2001
\textsuperscript{13} The Effect of Mandating HACCPs 2002
Fig. 5/1 illustrates the increase in the range of SPS risk related control points that have occurred in recent years. A decade ago, firms installing a HACCP system would have found their buyers satisfied with two or three control points. The increasing emphasis on the SPS related risks that are being looked at throughout the food chain is forcing firms to introduce more sophisticated systems than they would have done in previous years. The increased range and technical requirements tend to involve the use of foreign consultants in design and management/personnel training and consequently greatly increase the cost burden to ACP firms. Control point 2 in Fig. 5/1 shows the prominence of laboratory analysis, which is a relatively new burden for small ACP exporters to have to bear. The burden relates not only to the cost of laboratory equipment but also to the cost of training of personnel and the difficulty of finding competent technicians.

**Fig. 5/1: HACCP**

**Major critical control points for breaded fish production**

<table>
<thead>
<tr>
<th>CCP</th>
<th>Hazards</th>
<th>Control</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Receipt of raw materials</td>
<td>Chemical contamination</td>
<td>Certification</td>
</tr>
<tr>
<td></td>
<td>Filth</td>
<td>Visual check</td>
</tr>
<tr>
<td>2. Raw materials examination</td>
<td>Decomposition</td>
<td>Temperature check</td>
</tr>
<tr>
<td></td>
<td>Species substitution</td>
<td>Visual check</td>
</tr>
<tr>
<td>3. Batter mix</td>
<td>Chemical contamination Filth</td>
<td>Laboratory analysis</td>
</tr>
<tr>
<td>4. Storage</td>
<td>Decomposition</td>
<td>Visual check</td>
</tr>
<tr>
<td>5. Contamination</td>
<td>Species substitution</td>
<td>Temperature check</td>
</tr>
<tr>
<td>6. Finished product examination</td>
<td>Microbiological growth</td>
<td>Laboratory analysis</td>
</tr>
<tr>
<td>7. Packing</td>
<td>Overbreading</td>
<td>Weight check</td>
</tr>
<tr>
<td></td>
<td>Decomposition</td>
<td>Sensory analysis</td>
</tr>
</tbody>
</table>

**Source:** Department of Agriculture and Consumer Economics, University of Illinois

- **The need for certification and accreditation**

In many countries, acceptable (by EU importers) certification is only available from foreign organisations. A need exists for provision of some certification by domestic organisations that could provide a more cost-effective service. Certification is increasingly being required not only for the products being exported but also for the organisation producing them. These take two forms:

- Product certification attests that a product or service complies with the safety, fitness for use and/or interchangeability characteristic defined in a Code of Practice established by the market place.
- Organisation Certification demonstrates the conformity of, for example, an organisation's quality management system to the relevant model of the ISO 9000 series of management system standards.
Accreditation is the procedure by which an authoritative body gives formal recognition that a body or person is competent to carry out a specific function. Accreditation can be granted to a certification body for competency in any of the following:

- Quality system certification (ISO 9000)
- Laboratories (ISO/EC Guide 23)
- Personnel and training registration

General requirements for bodies operating product certification systems are established in ISO/EC Guide 65. Although accreditation is not mandatory it is increasingly required by the private sector and it is a precondition for mutual recognition agreements between two governments e.g. food safety control systems.

- **The need for more technical personnel**
The increasing technical requirements of SPS measures means that firms have to employ more technicians. These involve both production/process engineers and scientists for laboratory analysis. In many ACP countries, there is an inadequate supply of such qualified people.

- **The need for more management personnel**
The SPS measures are now tending to involve the whole production chain with a resultant need for additional monitoring and quality control managers at different points of the production chain.

- **The need for more training facilities and material**
The increased sophistication of production and use of more qualified personnel requires firms to integrate training programmes into their operations. This requires appropriate training facilities either in-house or sourced outside together with “user friendly” training “packages” on specific issues.

- **The need for information about alternate pesticides**
Many traditional pesticides used by growers in ACP countries are becoming unauthorised because of the increasingly stringent EU MRL requirements. A growing need exists for both information about acceptable substitutes and the development of new pesticides that meet the regulations. Without these, many small ACP growers will be prevented from exporting to the EU.

- **The need for domestic processing equipment**
The engineering sub sector of many ACP countries lack the capacity to supply the more technologically advanced processing equipment needed to ensure the standards of batch conformity and quality control now being required within the food production chain. This also often means that the associated consultancy and maintenance sector that supports such equipment is not available to the producer.
Availability of a local equipment supply sector with related support is a pre-requisite for the encouragement of many small primary producers to move to the next added-value stage of exporting processed products.

5.3 Costs of compliance to individual exporters

The impact of SPS measures on firms must necessarily reflect the influence of a number of factors, including geographical location (tropical pesticide problems); the country’s institutional development (certification/inspection problems); availability of local technical personnel (operating/maintaining new production processes); existing level of safety procedures (there may be no problem); existing relationship with EU importers (there may be assistance available to overcome the problem). Other factors are also relevant such as the position of the firm or product in the market, which may influence the extent to which additional compliance costs incurred can be transferred through the product price to the consumer.

Much attention is centred on the costs to firms of SPS measures, while less has been given to the other part of the impact analysis. This relates to the benefits that must inevitably appear in some form. Little work has been done in this area, although it seems clear that – as importers prefer demonstrably safe products - exporters with the best production systems are likely to attract more business albeit at the expense of firms whose systems inspire less confidence in compliance terms.

As a generalisation, however, it can be said that all firms can be expected to incur some additional costs in complying with specific SPS measures. However, it can be argued that small firms could experience disproportionately larger costs of compliance due to lack of economies of scale arising from in-house quality control facilities or in bulk rates from outside testing facilities (Loader and Hobbs 1999). Some support for this proposition comes from Henson and Heasman (1998) who find that unit compliance costs are negatively related to firm size and that large firms are generally more able to comply with regulations in a manner which yields competitive commercial advantage than is the case for small firms. This is particularly relevant to ACP countries whose private sectors are predominantly composed of SMEs.

Another aspect of compliance that probably affects smaller firms more severely is that many lack the trained technical personnel to put the required compliance procedures into practice. Consequently, they are dependent on the use of expensive foreign consultants both to set their system up and to train personnel. Larger firms may well have to involve foreign technical experts in the establishment of more sophisticated systems but the cost is not the same in relative terms.

As indicated earlier in the study it is not feasible to attempt to quantify what SPS measures cost an individual exporter. What is possible however is to identify measures that are generally being promoted by importers and standards’ setters as good practice and that
contribute to satisfying the principle compliance requirements. The following is a menu of costs providing an indication of the general order of expenditure for particular activities that ACP exporters are faced with if they wish to maintain market access to the EU. The degree to which any of the activities or sub activities is adopted must necessarily depend on factors specific to individual business. The costs identified do however provide some indicators as to the likely component cost of compliance actions.

5.3.1 ‘Menu of costs’

- **The cost of HACCP**

  These systems are proving to be one of the major conduits for the imposition of SPS costs on exporters.

  Case studies of HACCP implementation in ACP countries are not readily available in any detail. However, looking at a study\(^{14}\) carried out in the US in 2000 in the breaded fish industry provides some useful indicators of component costs. Some of the types of fish processed and the filleting and freezing elements have relevance to the seafood sector in many ACP countries. It is possible that the costs may vary but as it is likely that foreign consultants/technicians will be used and foreign equipment imported there should not be a great difference in the monetary cost incurred by an ACP exporter. There is, however, a much greater cost to a firm in a developing country when this is looked at in the context of their available resources.

  Fig. 5/2 outlines the average component costs for firms installing a minimum of two control points (regarded as the minimum to satisfy domestic US FDA requirements) and those installing a more sophisticated system covering 5 or 6 major control points. The costs are not the total costs incurred, many of which are firm specific (or multi purpose) but intended to indicate those that are likely to constitute substantial additional SPS specific related expenditure.

  In most HACCP operations, one of the heaviest costs in a multi point control system relates to the cost of creating several new administrative overheads in the form of quality control monitoring and analytical personnel. (Item 3 Fig. 5/2)

- **Cost of new pesticides**

  Compliance with EU pesticide approval regulations and MRL tolerances puts pressure on growers to find substitutes for many of their traditional products used to control pests and diseases. In many cases, the information about suitable alternatives is not easily accessible to growers and smallholders in particular find it difficult to identify what alternative might be acceptable and where to obtain it. A report by the World Bank\(^{15}\) on Kenya estimates that the Chemical Association of Kenya spends upwards of $150,000 p.a. on information dissemination but not all ACP countries enjoy this measure of information support.

\(^{14}\) The Model of the Cost of HACCP Implementation in the Seafood Industry

\(^{15}\) The Transformation of the Kenyan Fresh Vegetable Trade
**Fig. 5/2: HACCP**

**Indicative first year costs for breaded fish companies in the United States**

<table>
<thead>
<tr>
<th>Activity</th>
<th>Complexity of HACCP Plan</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td><strong>2 Control Points</strong></td>
</tr>
<tr>
<td>1. HACCP Plan Design</td>
<td>US$ 8,700</td>
</tr>
<tr>
<td>2. Training</td>
<td>US$ 4,900</td>
</tr>
<tr>
<td>3. Control and record keeping e.g. equipment, laboratory analysis, additional monitoring personnel</td>
<td>US$17,400</td>
</tr>
</tbody>
</table>

Note:
(a) The costs are the result of a survey of eight companies in the US and are an average of the costs involved under each activity, which necessarily varied from company to company.
(b) The raw material is either cod, haddock, pollock, flounder, sole, perch or whiting
(c) the finfish meat is subjected to heading, eviscerating, filleting, skinning and freezing before undergoing a process of breading
(d) the finished product is commercially sold frozen in the shape of portions, sticks and fillets

**Source:** Department of Agriculture and Consumer Economics, University of Illinois

Even where these difficulties are overcome, (sometimes through the assistance of the EU-funded PIP) the actual cost of the alternatives can be greater than previously. Fig. 5/3 illustrates how the changes in pesticide usage for the Kenyan horticultural sector have sometimes resulted in higher costs per hectare. The table indicates the principal driver of change for particular products and the benefits associated with the new pesticide. Although some changes result in price increases per hectare (e.g. Okra rising from $5 to $48 per hectare) others result in a fall (e.g. baby corn falling from $17 to $7 per hectare).

- **Cost of certification**
  The actual implementation costs of compliance will necessarily vary according to individual firm requirements. On top of these variable costs, however, are other costs that are likely to be more constant albeit still somewhat variable according to the time actually involved.

These costs relate to the fees payable to the independent certifiers (e.g. SGS). These involve a man-day charge of approximately €1000 per day plus travel costs and subsistence. An audit and verification of a medium-sized plant is estimated to take on average 5 days, which equals €5000 plus approximately €3000 travel/subsistence. This total of €8000 is unlikely to be reduced below €4000 (3 man-days, travel and subsistence) even for a small operation.
**Fig. 5/3: Illustrative changes in pesticide usage for vegetable export commodities**

<table>
<thead>
<tr>
<th>Crop</th>
<th>Problem (pest disease)</th>
<th>Old pesticide or remedy</th>
<th>Cost per Hectare US$</th>
<th>New pesticide or remedy</th>
<th>New cost per hectare US$</th>
<th>Reason for change</th>
<th>Safety and environmental profile</th>
</tr>
</thead>
<tbody>
<tr>
<td>French beans</td>
<td>Rust</td>
<td>Triforine, Triadimenol</td>
<td>33, 38</td>
<td>Hexaconazole, Tebuconazole, Trifloxystrobin</td>
<td>29, 28, 50</td>
<td>2, 5</td>
<td>Shorter PHI, Favourable features</td>
</tr>
<tr>
<td></td>
<td>Catterpillars</td>
<td>Endosulfan</td>
<td>17</td>
<td>Bacillus thuringiensis</td>
<td>25</td>
<td>2, 5</td>
<td>Natural Produce (BT)</td>
</tr>
<tr>
<td></td>
<td>Soil pests</td>
<td>Thiram, Lindane</td>
<td>5</td>
<td>Imidacloprid</td>
<td>48</td>
<td>2, 5</td>
<td>No leaching</td>
</tr>
<tr>
<td>Runner bean</td>
<td>Rust</td>
<td>Oxycarboxin</td>
<td>35</td>
<td>Tebuconazole, Trifloxystrobin</td>
<td>28, 55</td>
<td>2, 5</td>
<td>No leaching</td>
</tr>
<tr>
<td></td>
<td>Leaf miners</td>
<td>Dimethoate</td>
<td>5</td>
<td>Thiadloprid</td>
<td>48</td>
<td>2, 6</td>
<td>Safe to beneficials</td>
</tr>
<tr>
<td>Snap pea</td>
<td>Thrips</td>
<td>Pirimiphosmethyl</td>
<td>25</td>
<td>Thiadloprid</td>
<td>48</td>
<td>2, 6</td>
<td>Rapid breakdown in the soil</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Spinosad</td>
<td>67</td>
<td>2, 6</td>
<td>Natural product</td>
</tr>
<tr>
<td>Garden pea</td>
<td>Aphids</td>
<td>Dazinon</td>
<td>27</td>
<td>Deltamethrin</td>
<td>7</td>
<td>3, 5</td>
<td>Pyrethroid, rapid breakdown</td>
</tr>
<tr>
<td></td>
<td>Whiteflies</td>
<td>Methomyl</td>
<td>26</td>
<td>Thiadloprid</td>
<td>48</td>
<td>2, 6</td>
<td>Very low mobility in soil</td>
</tr>
<tr>
<td>Okra</td>
<td>Aphids</td>
<td>Oxydemetonmethyl</td>
<td>5</td>
<td>Thiadloprid</td>
<td>48</td>
<td>2, 6</td>
<td>Rapid breakdown in soil</td>
</tr>
<tr>
<td>P. mildews</td>
<td>Triforine</td>
<td>33</td>
<td>Trifloxystrobin</td>
<td>55</td>
<td>2, 5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Chillies</td>
<td>Anthracnose</td>
<td>Chlorothalonil</td>
<td>22</td>
<td>Trifloxystrobin</td>
<td>55</td>
<td>2, 5</td>
<td>Less Toxic Pyrethroid</td>
</tr>
<tr>
<td>Baby corn</td>
<td>Stalk Borer</td>
<td>Endosulfan</td>
<td>17</td>
<td>Beta-cyfluthrin</td>
<td>7</td>
<td>2, 5</td>
<td></td>
</tr>
<tr>
<td>MSV soil pests</td>
<td>Thiram, Lindane</td>
<td>5</td>
<td>Imidacloprid</td>
<td>48</td>
<td>2, 5</td>
<td></td>
<td>Lower toxicity</td>
</tr>
</tbody>
</table>

Usual reasons for change, some of which are reflected above: (1) Global ban, (2) withdrawal of product: non-re-registration in EU, (3) reduction in MRL in EU, (4) build-up of pest resistance, (5) superior performance efficacy, or (6) significantly better safety and/or environmental profile.

Source: World Bank
Whilst this is a common indicator of costs, the total may be increased by additional fees charged for the issuance of the certificate itself. In some cases, e.g. SGS this can be as much as US$2000. On the other hand, some international bodies with regional offices charge a much lower man-day rate when using regionally based personnel – US$500 is usual for Africa.

It must be noted, however, that the certificates issued vary in time of validity and usually have to be re-verified annually (in the case of some HACCP operations even more frequently). These renewal audits typically last 3 days giving a likely continuing annual cost burden of around €3-4000.

- **Cost of meeting ISO standards**

ISO requirements for exports to the EU also add to costs. The EU, at both official and private sector (importer) level, is increasingly requiring that exporters to the EU have ISO 9000 certification. This is generally ISO 9002 for food processing plants. It is seen as important in the area of food safety because certification confirms that the physical plant, its management and personnel and production operations are consistently managed in such a way as to produce a consistent product. ISO certification organisations advising food processors in developing countries often require 2-3 years to approve Good Manufacturing Programmes (GMPs) and the implementation of an HACCP plan before ISO 9000 certification becomes possible. Many industry analysts believe that ISO 9000 certification will become a requirement for the importation of processed and packaged foods.

ISO certification costs vary greatly according to the complexity of the plant. In the mid-1990s, Humpal and Guenette\(^6\) found that in Morocco the basic assessment for a small plant (1000 mt) involving certification and plant and personnel meetings cost US$3000 for the two-year ISO certification programme. Costs for larger plants are necessarily higher, but (except for the costs of physical plant upgrades) do not increase directly with the scale of operations. A moderately complex plant handling approximately 5000 MT of product would probably take two years and cost approximately US$150,000 to certify.

For small and medium enterprises, the adoption of ISO systems is seen as a necessary element in exporting to the EU. It does, however, present a problem where staff literacy is low and the accompanying paperwork is burdensome. SMEs seeking to produce intermediate products for further processing or to undertake processing for foreign firms can find their development (and that of the sub sector) stymied by such practical difficulties.

- **Cost of freezing and processing plant**

Fig. 5/4 is the result of a FAO review of the requirements of the private sector in Tanzania for fish products. This is useful in illustrating individual company specific expenditure covering the establishment of new plants at an average cost of US$80,000 each and the

\(^6\) Processed Food Safety in Developing Countries 2000
upgrading existing plants at US$40,000 each. Modern freezing and chilling plant and equipment is a pre-requisite to meet EU SPS regulations.

**Fig. 5/4: Tanzania: Estimated cost of specific SPS-related private sector investments in fish sector**

<table>
<thead>
<tr>
<th>Investment</th>
<th>Units</th>
<th>Costs</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Upgrading of processing plants</td>
<td></td>
<td></td>
</tr>
<tr>
<td>General refurbishment</td>
<td>11</td>
<td>US$66,000</td>
</tr>
<tr>
<td>Equipment</td>
<td>11</td>
<td>US$374,000</td>
</tr>
<tr>
<td>Sub total</td>
<td></td>
<td>US$440,000</td>
</tr>
<tr>
<td>2. Establishment of new plants</td>
<td>2</td>
<td>US$160,000</td>
</tr>
<tr>
<td>3. Construction of ice and chilling plants</td>
<td></td>
<td></td>
</tr>
<tr>
<td>- Ice plants</td>
<td>17</td>
<td>US$32,000</td>
</tr>
<tr>
<td>- Chilling rooms</td>
<td>16</td>
<td>US$19,200</td>
</tr>
<tr>
<td>Sub total</td>
<td></td>
<td>US$51,200</td>
</tr>
<tr>
<td>1. Improved artisanal gillnetting</td>
<td>200</td>
<td>US$14,600</td>
</tr>
<tr>
<td><strong>Total Private Sector Investment</strong></td>
<td></td>
<td><strong>US$765,800</strong></td>
</tr>
</tbody>
</table>

Note: Approximately 26,000 artisanal fishermen are directly employed in the sector and nearly 500,000 people are employed in some way in fisheries related activities

**Source:** FAO 1997
Substantial measures for capacity building and technical assistance for developing countries have been a feature of the world trade scene for many years. Most of this has, however, been targeted at infrastructural projects such as transport, sector reform, and support for governments to upgrade public services. Less has been directed to assisting the private business sector through the creation of national business support services and direct assistance to individual firms has featured towards the bottom of the priority list. This lower prioritisation is unfortunate because direct assistance to individual enterprises not only assists them in upgrading their processes and procedures to meet SPS (and other related regulations) but also in many instances contributes to national capacity building through the establishment of organisation in-house laboratory testing facilities.

This situation is, however, changing and more technical assistance programmes provided by organisations such as the FAO, UNCTAD, UNIDO, World Bank, IMF, and EU are increasing the amount and scope of support available specifically to help developing country exporters meet the new wave of developed country import regulations. UNIDO’s Business Partnership Programme and Entrepreneur Achievement Programme are good examples of this new orientation.

Having said this, however, it must be acknowledged that some of the more general capacity-building assistance although not specific to trade development does contribute to easing the firm specific costs of SPS compliance. For example, the lack of available finance at commercially viable interest rates is a major impediment to SMEs purchasing compliance-related instrumentation and equipment. Reform of the banking sector has made credit more accessible to fund SPS measures in countries where such wider capacity building has occurred.

Technical Assistance and Capacity Building are seen by many as the foundations on which the consensual support of developing countries for the Doha mandate is based. Important elements of this are the Joint Integrated Technical Assistance Programme for African Countries (JITAP\textsuperscript{17}) and the Integrated Framework of Trade Related Technical Assistance focused on LDCs involving collaboration with regional development banks, UN Regional Economic Commissions and other institutions. The New Partnership for African Development (NEPAD) has a Market Access initiative, which includes assistance to meet standards such as SPS.

In an acknowledgement of the importance of these issues, the Doha Development Agenda Trust Fund was established in December 2001 and WTO members pledged about €16m in 2002 with about €3m having been pledged (at February 2003) in advance for 2003. The

\textsuperscript{17} JITAP is a programme by the WTO, ITC and UNCTAD to provide technical assistance to African countries. Among its objectives is to help countries enhance the readiness of their exporters to participate in the Multilateral Trading Systems.
aim of the Fund is "to ensure long-term funding for WTO technical assistance" although members' views diverge widely on what this assistance should cover.

6.1 SPS specific assistance

A number of organisations provide a mixture of country and firm specific assistance that is focused on assisting developing countries exporters to meet SPS requirements. Some of this is general and some sector specific where a particular need has been identified e.g. fish. The following list does not pretend to be exhaustive:

- **Pesticides Initiative Programme (PIP)**
  The EU funded COLEACP scheme of assistance “Pesticide Initiative Programme” (PIP) is a five-year programme that started in 2001 with a budget of €29m. The programme is particularly targeted at the SME sector of ACP horticulture, which will be severely impacted by EU legislation setting MRLs by default at zero in the absence of sufficient experimental data.

  Fig 6/1 shows a selection of projects that have been approved for support under PIP and provides an indication of typical project costs. Support is specifically designed to help firms meet SPS measures by contributing to the cost of adopting Best Manufacturing Practice, training of operators etc. The programme is designed to contribute to the specific elements of a project that relate to SPS measures and consequently the percentage of assistance offered is less than the overall cost, which normally involves other activities targeted at other objectives. The cost to COLEACP column in the table consequently identifies the SPS element of the projects that range from 26% to 80% of total costs. The list does not reflect the full scope of the programme, which has many more projects under consideration and awaiting final approval.

  **Vulnerability of small suppliers**: Particularly vulnerable is the large number of very small suppliers who are typical of many ACP countries’ horticultural sectors. The horticultural export sector comprises approximately 500,000 small and medium-sized farms and is a major employer. Exports from the sector were approximately €55m annually before the effective application of the EU pesticides residue regulations. If bananas are excluded (as large multinationals (who dominate the sector) are well able to meet the requirements), approximately €400m of exports are at risk. COLEACP suggest that in the absence of appropriate measures, these exports could be reduced by some €60m annually with losses, mainly concentrated in small and medium sized firms.

  **MRLs and aflatoxins** Considerable debate centres on the MRLs established for aflatoxin contamination in foodstuffs. This has been well recorded in various studies by Henson et al and will not be repeated here other than to note that the levels required by the EU were in excess of those many experts considered justifiable on health and safety grounds. For

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18 The USA, for example, considers that the WTO should restrict the assistance to capacity building that directly assists countries in negotiations and not extend to broader developmental assistance.
the purpose of this study, it is useful to note that Otsuki et al\(^\text{19}\) show that aflatoxin B1, the most prominent and toxic of the four major aflatoxins (B1, B2, G1 and G2) has been identified in corn and corn products, ground nuts and groundnut products, cottonseed and tree nuts, such as Brazil nuts, pecans, pistachio nuts and walnuts, all of which are of importance to ACP exporters.

Whilst no specific estimate of compliance costs for this legislation is available, it is clear that many of the exporting countries concerned are in the lowest income groups as measured by the World Bank’s classification and may be least able to afford the necessary compliance measures. Otsuki et al suggests two possible cost indicators. One relates to an estimate by the US groundnut industry that complying with the EU sampling method would result in an additional US$150 cost per lot (1 lot=16 tons) for raw groundnuts. For developing countries, the cost is likely to be higher. The second estimate is that the legislation could decrease African exports by 64% or around US$670m although no breakdown of the basis for this figure is available.

Technical assistance programmes from other sources e.g. World Bank and FAO are also operating in this area of concern.

- **Infopêche**
  The intergovernmental organisation for Marketing Information and Co–operation Services for Fishery Products in Africa (Infopêche) aims at developing trade and trade opportunities. Its work includes company training and support to governments through surveys. It is particularly focused on the provision of technical advice on fish technology, quality assurance and HACCP.

  The Fish sector in Africa has been identified by INFOPECHE\(^\text{20}\) as a priority for HACCP and together with FAO, UNIDO et al has assisted in getting many African fish producing countries authorised by the EU to export to it. The National Fish Inspection programmes established to achieve this resulted in the private sector having to invest heavily in plant upgrades to satisfy the EU requirements in several ACP countries (Namibia US$10m; Senegal US$8m; Mauritania US$5m; Uganda US$1.6m and Ghana US$1m).

- **Strengthening Fishery Products Health Conditions Programme (SFP)**
  In 2002, the EU announced the creation of a new programme (SFP) of assistance with funding of approximately €50m. A principal driver of this initiative was the difficulty many ACP fishery exporters will have when EU Decision 2001/4 (see section 2) harmonising EU import procedures comes into effect at the end of 2003. A particular focus is likely to be on the establishment of Competent Authorities and the upgrading of local analytical laboratories.

\(^{19}\) "A Race to the Top" – a case study of food safety standards and African exports

\(^{20}\) The intergovernmental organisation for marketing information and co-operation services for fishery products in Africa
### Fig. 6/1: Specimen project costs of meeting EU pesticide legislation (MRLs)

<table>
<thead>
<tr>
<th>Country</th>
<th>Product exported per Project</th>
<th>Annual tonnage</th>
<th>Total project Cost</th>
<th>Cost to COLEACP</th>
<th>Cost to Exporters</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td>€ 000</td>
<td>€ 000</td>
<td>% project</td>
</tr>
<tr>
<td>Kenya</td>
<td>Green Beans</td>
<td>700</td>
<td>102</td>
<td>62</td>
<td>61</td>
</tr>
<tr>
<td></td>
<td>Avocado and mango</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Green beans and baby sweet corn</td>
<td>12000</td>
<td>441</td>
<td>238</td>
<td>54</td>
</tr>
<tr>
<td></td>
<td>Peas, passion fruit</td>
<td>500</td>
<td>216</td>
<td>132</td>
<td>61</td>
</tr>
<tr>
<td></td>
<td>Green beans, peas, avocado</td>
<td>3800</td>
<td>828</td>
<td>232</td>
<td>28</td>
</tr>
<tr>
<td></td>
<td>Green beans, peas, passion fruit, avocado</td>
<td>8000</td>
<td>301</td>
<td>148</td>
<td>49</td>
</tr>
<tr>
<td></td>
<td>Green beans, peas, passion fruit</td>
<td>300</td>
<td>184</td>
<td>83</td>
<td>45</td>
</tr>
<tr>
<td>Ivory Coast</td>
<td>Pineapples and bananas</td>
<td>9800</td>
<td>250</td>
<td>125</td>
<td>50</td>
</tr>
<tr>
<td></td>
<td>Pineapples</td>
<td>2500</td>
<td>273</td>
<td>71</td>
<td>26</td>
</tr>
<tr>
<td>Guinea Conakry</td>
<td>Mangos</td>
<td>600</td>
<td>130</td>
<td>69</td>
<td>31</td>
</tr>
<tr>
<td>Burkina Faso</td>
<td>Green Beans</td>
<td>300</td>
<td>110</td>
<td>77</td>
<td>33</td>
</tr>
<tr>
<td></td>
<td>Green Beans</td>
<td>100</td>
<td>78</td>
<td>60</td>
<td>77</td>
</tr>
<tr>
<td></td>
<td>Green Beans</td>
<td>100</td>
<td>59</td>
<td>44</td>
<td>75</td>
</tr>
<tr>
<td>Senegal</td>
<td>Green Beans, Mangos and cherry tomatoes</td>
<td>280</td>
<td>60</td>
<td>43</td>
<td>72</td>
</tr>
<tr>
<td></td>
<td>Green Beans</td>
<td>500</td>
<td>66</td>
<td>59</td>
<td>44</td>
</tr>
<tr>
<td></td>
<td>Green Beans</td>
<td>300</td>
<td>117</td>
<td>81</td>
<td>69</td>
</tr>
<tr>
<td>Cameroon</td>
<td>Green Beans and cherry tomatoes</td>
<td>3500</td>
<td>109</td>
<td>87</td>
<td>80</td>
</tr>
<tr>
<td></td>
<td>Pineapples</td>
<td>800</td>
<td>102</td>
<td>74</td>
<td>73</td>
</tr>
<tr>
<td>Jamaica</td>
<td>Pineapples, Bios and other</td>
<td>800</td>
<td>97</td>
<td>78</td>
<td>80</td>
</tr>
<tr>
<td></td>
<td>Papaya</td>
<td>1000</td>
<td>159</td>
<td>67</td>
<td>42</td>
</tr>
</tbody>
</table>

Source: COLEAP/PIP
Similar in operation to the PIP programme, the SFP Programme aims to improve the access of ACP countries' fish and fishery products to the world markets by strengthening export-related health controls and improving production conditions in beneficiary countries. Fig. 6/2 indicates the scope of projects eligible for support from the Fund.

**Fig. 6/2: Projects eligible for assistance**

<table>
<thead>
<tr>
<th>Support services</th>
<th>Project Host</th>
<th>Competent Authority</th>
<th>Laboratory</th>
<th>Private sector</th>
<th>Artisanal fisheries</th>
</tr>
</thead>
<tbody>
<tr>
<td>Assistance</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Training</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Equipment</td>
<td>Yes</td>
<td>Yes</td>
<td>No</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Infrastructure</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>Yes (limited)</td>
</tr>
</tbody>
</table>

Source: SFP Programme, PMU

- **Standards and Trade Development Facility (STDF)**
  The STDF was established jointly in 2002 by the FAO, WTO, WHO, OIE and World Bank. It was the direct response to the Doha Agreement that assistance to developing countries needs to be better co-ordinated. The fund started with a contribution of US$300,000 from the World Bank and approximately €75,000 from the WTO. This funding is regarded as an initial start-up finance and additional contributions are being sought for the period beginning July 2003. The fund has four basic objectives:

  - To help developing countries participate in the establishment of relevant SPS standards.
  - To co-ordinate development assistance in SPS-related areas
  - To enhance the capacity of developing countries to meet international standards
  - To help train national officials and scientists.

- **Other organisations**
  In addition to the major international organisations, there are other bodies that are active in providing technical assistance that can cover SPS requirements. Some of these such as UN-UNIDO (ITPO), STIC (Sustainable Trade Innovation Centre), CUTS (Consumer Unity and Trust Society) are international, some like African Development Fund, Sanprota (Southern African Natural Products Association), SEATINI (Southern and Eastern Africa Trade Information and Negotiations Initiative), SAEN (Southern African Enterprise Network) and The Horticultural Training Trust of Zambia are regional.

  Many of these receive funding from major aid donors (IMF, UNIDO etc.) and bilateral donors. In some instances, as with UNIDO, donors can specify objectives for their donations, which can include SPS-related capacity building.
7 Conclusions and recommendations

7.1 Conclusions

The remit of this study has been to examine the consequences of the SPS Agreement on ACP trade with the EU. The precise nature and scope of these consequences, however, are not easily identified and cannot in any event be considered in isolation. Commercial market forces and the intervention of technical assistance at various points of the trading chain all have varying degrees of influence. These affect the impact of SPS measures at both individual exporter and country level.

Nevertheless, some conclusions are apparent from the study, which whilst not representing a full answer, may be considered as a contribution towards this. These are set out below:

- ACP members do not constitute a cohesive economic bloc but represents a varying range of economic development, product dependency and political interest in institutional change. There will, therefore, always exist some element of competitive advantage to some countries that will outweigh any gain that might accrue to other countries through the removal of SPS related barriers. It cannot therefore be construed that all ACP countries will necessarily benefit by an increase in exports on the basis that the removal of SPS barriers creates “a level playing field”.

- One of the broader consequences of improving national infrastructural capacity and assisting private sector enterprises to become SPS compliant is to make such countries and firms more attractive for foreign investment. Such investment flows assisted the emerging Asian economies to build on their economic reform and liberalisation in the 1980/90s. Such flows are, however, highly selective and difficult to predict without an examination of the market potential that exists in many ACP countries. Such investment flows will, however, undoubtedly occur and their impact in terms of GDP, employment and export earnings for some countries will greatly exceed the cost related to making them SPS compliant.

- The SPS Agreement has had a negative impact on many ACP countries’ market access to the EU. The extent of this varies from country to country and between products but as a generalisation, African countries have been most affected and exports from the fisheries sector particularly, across the whole bloc have been significantly impeded.

- The great majority of SMEs that constitute the principal body of ACP commercial life find difficulty in acquiring information about what the increasingly complex EU regulations require them to do. Those that do understand what is required have difficulty in complying because of a range of barriers
  - Insufficient funds to install the requisite modern equipment/systems (e.g. HACCP)
- Unavailability of credit finance at commercial rates to meet compliance requirements
- Scarcity of the technical personnel
- Inadequate national support organisations, such as certifiers, laboratories etc.

An increasing volume of EU/ACP trade is being conducted through importers who are themselves retailers or are associated with large retail chains. These importers are exercising their privileged position to enforce private sector SPS Codes of Practice, which may additionally involve compliance with other issues such as social and environmental practice.

The increasing complexity and cost of meeting SPS is

- Forcing formerly independent producers to become dependent on single supplier contracts with major EU importers who in return assist them to meet SPS measures
- Deterring small growers and producers of semi-processed foodstuffs from taking the next step of development into processing where the main potential for added value profit exists. Sector development is therefore being frozen
- Deterring firms currently only supplying the domestic and/or regional market from exporting. Many of these are capable of exporting internationally but do not see commercial advantage in meeting the ongoing costs of SPS standards that their products must carry on their price on foreign markets
- Placing increased burdens on national exchequers, which often do not have the finance available to provide the necessary inspection services etc. For some very small economies, these services are not self-supporting and represent a continuing drain on resources.

The SPS Agreement and the WTO Forum has served as a focus for developed countries (including the EU) to accept that their increasing requirements for greater health and safety cannot be met by most developing countries, particularly those represented by the ACP bloc. The Doha Ministerial meeting was basically about market access and whilst not as strong as many observers deemed necessary the amendments to the wording of the SPS Agreement relating to originators of SPS measures providing assistance to meet them is more progressive than has been previously achieved.

In this context, the Agreement can be viewed as having a positive effect on ACP countries as it has forced developed countries to provide more technical assistance for infrastructural development. Such development contributes to the whole economic capacity of recipient countries in terms of GDP, employment creation, social and environmental improvement whose benefits go beyond the value of any enhanced export earnings. This is a positive consequence of the existence of the SPS Agreement, which is often overlooked.
It is regrettable that some ACP countries’ domestic situation makes them less likely to be able to benefit from the capacity building assistance that is available and these countries’ exports must inevitably continue to be progressively eroded by their inability to meet SPS (and other) standards.

Cost estimates

- Whilst it is beyond the scope of this study to quantify the monetary costs of the SPS Agreement, some indicators do exist that suggest that substantial amounts are involved. Quantifying these would depend very much on the parameters established for “consequences” and offsetting “benefits”. Nevertheless it is possible to note that:
  - COLEACP suggests that the ACP horticultural sector has €850m of exports at risk from the EU Pesticides regulations, which could reduce exports by €60m annually. Similarly, estimates (Otsuki et al) of the impact of lower Aflatoxin MRLs in foodstuffs suggest that African exports could potentially decrease by around US$670m (approx 64% of total).
  - This study has identified 16 countries whose fish exports to the EU (currently confined to specific members) will cease at the end of 2003 if they are unable to meet the wider requirements for entry and free circulation throughout the single market. Fish exports of these countries to the EU amount to approximately €209m pa, all of which is at risk. This represents 8.4% of total EU/ACP fish imports of €2.5bn.

- Whilst the above indicate the potential impact on the export trade, other costs have also to be considered including:
  - Costs of national capacity building (country specific) (a)
  - The costs of initial compliance (firm specific) (b)
  - The annual costs of maintaining compliance (firm specific) (c)

The answers to a) and b) depend not least on knowledge of the existing situation in each of the ACP countries. Section 5 provides an indication of the component inputs to such a calculation. For c) any estimate must only be indicative and subject to revision, as and when further studies produce more specific data.

That said, however, one approach that has been used to assess general costs across sectors is to reflect the average cost of particular measures (where these are significant enough to count) in terms of their related overheads as a percentage of turnover. There are obvious flaws in this approach as not all firms export all their produce and even then, not all goes to the EU. Nevertheless, the approach may provide an indicator (in an area of forecasting where few indicators exist at present) to the continuing cost of SPS measures to the ACP bloc as a whole.
Discussion during this particular SPS study and related studies on NTBs generally supports the view that SPS measures can represent between 2% and 10% of a company's export turnover. As a generality the smaller the company the higher the percentage, SPS related overhead. Taking the figure of €7bn total ACP food exports to the EU, as a base this shows between €140m and €700m as an annual additional cost to be met by the ACP exporting private sector. Much of this figure represents the additional cost of employment of technical, management and administrative personnel required to ensure and demonstrate compliance.

7.2 Recommendations

A considerable amount of work is already in progress through a wide range of agencies to tackle the problems developing countries are experiencing as a result of the increasing SPS requirements. Much of this, however, focuses on broader institutional capacity building and larger enterprises; insufficient attention is being paid to the problems that small firms experience at the sub-sector level. This is where the real consequences of SPS measures impact particularly hard in terms of unemployment, poverty and retardation of market development. A general recommendation is therefore that the various players (donors) implement small firm specific projects as an integral part of all their wider programmes.

More specifically the following seven recommendations are considered to reflect some of the negative aspects of EU SPS requirements. They also have as an underlying objective, an increase in the involvement of developing countries in decision-making about SPS remedial action at local level:

- **Public private partnerships**
  The increasing influence of large retail chains is exercised through private sector Codes of Practice. Non-compliance means exclusion from the EU market. Whilst many importers assist contracted suppliers to meet the requirements businesses that lie outside this favoured supply chain receive no benefits.

  An argument exists for the costs of compliance for a sector as a whole being spread more evenly and borne by the total food chain of supply. Existing EU supermarkets (particularly in the UK) make considerable profits (higher than their USA counterparts) from the re-packaging and sale of ACP agricultural produce and could well afford to assist more widely in the meeting of the standards they themselves establish.

  It is recommended that Public Private Partnerships (PPP) be established between ACP governments and major EU importers operating in their territory. Such PPP could be based around Food Safety Funds (FSFs) to which importers would contribute an agreed percentage of the value of their country-specific imports, which together with national and international donor contributions would be targeted specifically at
encouraging a wider range of businesses to become SPS compliant exporters. The hitherto excluded grower sector would be a principal beneficiary.

- **Local inspection sites**
  EU import bans based on phytosanitary concerns are often introduced quickly and inadequacies within developing countries' scientific infrastructure can lead to requests for extended periods before any scientific challenge can be mounted. In the meantime, exporters are at risk of returned cargoes.

  It is recommended that inspection sites within the exporting countries' borders be established to minimise the potential disruption in ACP/EU trade. In such instances, the sites would be manned by inspectors from a number of states able to call upon scientific experts when necessary. These sites would check for signs of disease or insects before shipment, thereby saving exporters shipping charges (on returned goods) and allowing them the opportunity of fixing any problem at an early stage.

  The international nature of the sites would go some way to meeting exporters' claims that EU inspections are not completely impartial.

- **Delayed implementation of EU conformity in assessment in fish imports**
  Whilst the new SFP programme is aimed at strengthening the capacity of the fish exporting countries, it is unlikely to prevent some ACP countries becoming excluded from their traditional EU export markets when Decision 2001/4 becomes operative at the end of 2003. Clearly the amount of time remaining in 2003 is insufficient to allow comprehensive inspection, needs assessment, design and implementation in all the countries likely to be affected.

  It is recommended that implementation of this Decision be postponed until the completion of the SFP programme whose basic objective is to prevent such EU legislation having such a negative impact. No health risk would arise from such a delay.

- **Regional accreditation bodies**
  There are no internationally recognised accreditation bodies in many ACP countries, which forces laboratories to have themselves accredited by overseas bodies. This is an expensive process and as it is not always understood that not all forms of accreditation (or bodies issuing such approval) are equal; this can lead to downstream problems with SPS certification.

  It is recommended that priority should be given to the establishment of ACP specific regional networks of accreditation organisations that can be used at reasonable cost by ACP laboratories to acquire fully acceptable accreditation. Expansion of the existing International Accreditation Forum (IAF) Regional Group could be a possible basis for this action.
• **Micro credits for micro purchases**
A need exists for more assistance at the firm specific level. This not only covers the identification of technical analysis of products and production processes where much is increasingly being done but also an increase in the availability of implementation finance. Small firms, particularly those that are the result of fragmented liberalisation of state monoliths, have great difficulty in financing the purchase of even basic monitoring instrumentation and are often excluded from the benefits of larger assistance programmes. The amounts required are often relatively small.

It is recommended that some of the additional finance following Doha be made available to support the activities of recognised advisory bodies such as National Bureau of Standards. These could then be in a position of not only providing the advice as to what a problem was and how to remedy it but also to facilitate the actual implementation of its recommendations.

The finance could be made available either as direct grant and/or through the medium of a SPS Revolving Fund providing loans lending at “soft” interest rates. Repayments would help finance further projects over the lifetime of the fund which would be of limited duration.

The provision of such micro credits would do much to help the large numbers of small ACP firms who are being forced out of the international export market because of SPS related requirements.

• **“Piggy backing” schemes**
There is conclusive evidence that when firms in developed countries collaborate with their counterparts in developing countries technology transfer occurs in favour of the developing country. Such technology transfer also includes training and expertise in Quality Management Systems, Best Practice, HACCP etc. as they relate to SPS requirements.

The UNIDO Investment and Technology Programme Office (ITPO) actively promotes this concept of technology transfer via private sector joint ventures and are often referred to as “piggy backing”. UNIDO co-fines the UK, ITPO, which has found this exercise particularly relevant to helping developing country exporters overcome SPS problems.

It is recommended that the “piggy backing” concept be more actively promoted both through existing European national ITPOs and through the creation of sector-based Joint Venture Bureaux (JVBs), which would take an active role in bringing together European and ACP companies having mutual commercial interests. Some of the larger chambers of commerce already active in the export field, would be useful administrators of such schemes (e.g. London, Birmingham or Manchester chambers in the UK).

• **Possible legal issues**
An examination of whether EU SPS legislation is open to challenge under WTO rules is beyond both the remit and competency of this study. Nevertheless during the period
of research, two issues were identified that are worth noting as being possible candidates for further consideration by a legal expert:

- **Traceability**

Regulation 178/2002 established a system of traceability within food organisations that covers the complete food chain from “farm to fork”. This is intended to supply sufficient information to allow targeted and accurate withdrawals of specific products and thereby avoid the disruption that blanket withdrawal of food types can cause. Legal opinion\(^{21}\) is that these provisions do not in themselves infringe EU commitments within the EU.

The area of the Regulation that may be open to question however relates to when importers apply the requirements to developing countries. In particular product sectors (e.g., cocoa and coffee) the produce of large numbers of small growers are “bulked” together to make exportable quantities. Traceability is clearly not a feasible option in such cases and the potential impact of the EU requirement will be much greater for particular exporters in developing countries where this is a traditional trading practice than for other traders.

That the measure having a greater impact on some portion of suppliers raises the question of whether the EU requirement is disproportionate in relation to the aim being pursued. The SPS Agreement makes clear that although a member state may introduce any measure this must be based on scientific evidence and be appropriate to the risk being addressed. The impact of traceability on some ACP exporters will be significant and the interval between the full application of the Regulation allows time for deeper examination of the issues involved.\(^{22}\)

- **Equivalence**

The SPS Agreement encourages members to accept as equivalent SPS measures of other members even if those measures differ from their own or those used by other countries. However, it is commonly considered that the EU tends to interpret “equivalent” as meaning “the same” as its own legislation.

This practice, if it is true, effectively deprives Art 4.1 of its function (which is to recognise that different measures can achieve the same level of sanitary and phytosanitary protection). This is important to developing countries whose protection regimes may reflect different climatic, developmental and technological conditions from those prevailing in the EU.

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\(^{21}\) O’Connor – Sanitary and Phytosanitary Measures and Non Tariff Barriers to Trade under the WTO and Cotonou Agreements 2002

\(^{22}\) Although Regulation 178/2002 entered into force on 21/2/02 the requirement for traceability (Art 68) apply from 1/1/05.
To ascertain whether a problem exists in this area it might be useful to conduct an examination that compares EU standards with the body of international and ACP national standards. Such an examination may clarify whether there are areas where the EU is unjustifiably insisting on the acceptance of its standards and/or possibly even imposing requirements on exporters that have no counterpart in other major markets.

It is recommended that a legal expert in WTO/SPS matters examines both these issues to identify if any remedial action by ACP countries could usefully be taken within the WTO.
Annexes
Acronyms and abbreviations

ACP  African, Caribbean and Pacific countries
BRC  British Retail Consortium
BSI  British Standards Institution
CBI  Centre for Imports from Developing Countries
CDE  Centre for the Development of Enterprise
CODEX  Codex Alimentarius
COLEACP  Comité de Liaison Europe-Afrique-Caraibes-Pacifique
COPs  Codes of Practice
EBA  Everything But Arms
EC  European Commission
ESA  European Spice Association
EU  European Union
EUREP  European Retailer Produce Working Group
EUROPAM  European Herb Association
FAO  Food and Agricultural Organization (UN)
FDA  Food and Drug Association (USA)
FSA  Food Standards Agency (UK)
FSFs  Food Safety Funds
FVO  Food and Veterinary Office
GAP  Good Agricultural Practice
GAFTA  Grain & Feed Trade Association
GATT  General Agreement on Tariffs and Trade
GMO  Genetically Modified Organisms
GMP  Good Manufacturing Practice
GSP  Generalised Scheme of Tariff Preferences
HACCP  Hazard and Analysis Critical Control Panel
IPPC  International Plant Protection Convention
ISO  International Standards Organisation
ITC  International Trade Centre
KEPHIS  Kenyan Phytosanitary Inspection Services
LDCs  Least Developed Countries
LOD  Level of Detection
MPS  Milieu Programma Sierteelt
MRLs  Maximum Residues Levels (for Pesticides)
NTBs  Non Tariff Barriers
OIE  Organisation Internationale des Epizooties
PIP  Pesticide Initiative Programme
PPPs  Public Private Partnerships
QMS  Quality Management Systems
RASFF  Rapid Alert System for Food
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<tr>
<td>SFP</td>
<td>Strengthening Fishery Products Health Conditions</td>
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<td>Société Générale de Surveillance</td>
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<td>TBTs</td>
<td>Technical Barriers to Trade</td>
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<td>United National Industrial Development Organisation</td>
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<td>World Trade Organisation</td>
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Principal body of EU legislation that has major consequences for ACP country exports to the EU

EC Legislation

1. **EC Regulation 178/2002** This regulation is of very broad scope; it establishes the general principles and requirements of food law, lays down procedures on matters of food safety, and establishes the structure and role of European Food Safety Authority (EFSA). It also covers the basic concepts of equivalence and traceability.

   The Regulation applies to all stages of production, processing and distribution of food and animal feed, setting the basic principle of the Farm to Table approach. It lays down that the general principles of food law including risk analysis, the precautionary principle and protection of consumers’ interests plus the general obligations of the different bodies in the food chain and their consequent liabilities. It also lays down the requirement for transparency rules (for public access to information), systems for data analysis, the rapid alert system and establishment of an organisational framework including the audit and control systems applicable to the EFSA.

   EFSA’s function is to provide the EU with independent scientific and technical advice to underpin policymaking and legislation in the area of food safety and in related areas of plant health, animal health and environmental protection. The Regulation also states that third countries with which the EU has concluded agreement might participate in EFSA.

   One development has been regarding the concept of “equivalence” (Art 1123). The Regulation is being revised as part of a review of Food Law and, drawing on Art 11 of Directive 91/493 (on fish and fish products). Under this, in circumstances where a country may not have its own facilities, EU authorities may accept as “equivalent” health certification issued by acceptable bodies in another countries. The most quoted cases are, Namibia, that can be certified by South Africa health certification bodies and New Zealand health authorities have a similar role for certain Pacific Islands.

2. **Council Directive 2000/29/EEC** relates to the requirements for issuing phytosanitary certificates for imported plant and plant products in order to prevent the introduction of harmful organisms into the Community. The legislation lists plants that are banned from entering the EU where infected by harmful organisms, (except in situations where infestation is minimal or in other designated circumstances). The law lays down that the main control is through inspections that can take place in the premises of overseas suppliers, and the need for imports to be accompanied by health certificates. The entry of such products into the member

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23 Many commentators from third countries have argued that the EU has been insufficiently flexible in its interpretation of “equivalence” and instead demanding “sameness”.

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Annex B
states is under the control of EU national authorities, normally those established as IPPC inquiry points, and reinforced by control points at the Community boundary.

3. **Council Directive 93/43/EEC** lays down the Food Hygiene requirements for product of animal origin, including HACCP systems and procedures. New hygiene rules are now being introduced that will introduce the concept of 'farm to the table' to hygiene policies and will, for the first time, create a single, transparent hygiene policy applying to all food operators including agreed steps to protect food safety. This new legislation will replace the patchwork of rules for specific sectors and types of produce, which have gaps notably at the farm and primary production levels.

The new legislation gives food producers primary responsibility for the safety of food through self-checking and modern hazard control techniques. It is integrating 16 existing product specific Directives and Directive 93/43 into a new 'Food Hygiene Package' of 4 Regulations. The first three cover general hygiene of foodstuffs, hygiene of food of animal origin and official controls on products of animal origin (intended for human consumption). Part four of the package (animal health rules for products of animal origin) will apply as of 1 January 2005 and will strengthen animal health requirements both within the Community and for imports. The package will remove a large number of regulations from the statute book (mainly 14-24 below).

4. **EC Regulation 466/2001** updates previous legislation including 315/93 and 194/97 that established maximum residue levels (MRLs) for certain contaminants in foodstuffs. It was introduced to resolve discrepancies between the laws of member states as regards maximum levels of contaminants that were affecting the Single Market. It lays down the principles of setting maximum levels, specifies the method of analysis and sampling methods to be used (laid down in previous Directives including Directive 79/70/EEC, 98/53/EC and 2001/22/EC), and monitoring procedures. It also takes account of potential variables (such as drying, dilution, processing).

Maximum levels set down include nitrates in spinach and lettuces, mycotoxins including aflatoxins in nuts, dried fruit, milk, processed products, dried cereals, plus heavy metals (cadmium, lead, mercury) in milk, children’s foodstuffs, meats including poultry, crustaceans, fruit juices, wines, vegetables and 3-monochloropropene as regards vegetable protein and sauces.

The regulation also makes provision for future legislation to establish maximum levels of contaminants in children's food and for maximum levels to be reviewed every 5 years.

5. **EC Regulation 1148/2002** covers the requirements for checking conformity for EU marketing standards both by EU states and third country inspection bodies.


7. **Council Directive 91/414/EEC** lays down the principles for drawing up the list of permissible and banned pesticides. It allows the establishment of national provisional MRLs only if no Community MRL exists. The basic Directive will be amended to bring it up to date, including fast track consideration of lower risk plant protection products, provisions on classification, labelling and packaging of dangerous products, environmental matters including entoxicology.
and data protection. EU regulations 768/95, 86/362 and 86/363 and 90/462 show maximum residues allowed in plants and animal products and are also to be amended.


9. Council Regulation 2092/91/EEC lays down the standards for production, processing, import, inspection and certification, marketing and labelling of organic products, both processed and non-processed. This has been amended several times, the latest being Regulation 1804/99 to include standards for organic livestock production. Before that, production was according to national standards. Regulation 2083/92 amended Reg. 2092/91 on third country imports to make provisions for imports from a third country that is not on the official Commission list of approved exporters of organic product. In order to ensure equivalence in the effectiveness of inspection and certification measure, third country certification bodies must satisfy the requirements of ISO Guide 65.

10. Council Directive 2001/18/EEC is the main legislation that authorises experimental releases and marketing of GMOs in the EU. Regulation 258/97/EC regulates the authorisation and labelling of “novel foods” including products containing GMOs, GM additives and flavourings must be labelled according to Regulation 50/2000/EC. New regulations have been proposed on traceability and labelling of GM Crops.

11. EC Regulation 1760/2000 repealing EC Regulation 820/97 (pursuant to Directive 64/432/EEC) establishes a system for the identification, labelling and advertising of bovine animals and beef products. It was stimulated by problems of BSE in the EU and develops further action taken previously to improve the transparency, conditions and marketing particularly as regards traceability. It sets down a scheme for identification and registration, ear tagging, computerised databases for the tracing of animals, compulsory labelling schemes to ensure a clear link between the animal and the meat products, voluntary labelling system for other purposes and the establishment of third country bodies for the approving of such labelling.

12. Directive 97/78/EEC deals with veterinary checks on imports into the EU from third countries.

13. Directive 91/497/EEC amending Directive 64/433/EEC and further amended by 95/23/EC lays down health conditions for the production and marketing of fresh meat for human consumption including domestic bovines, pig- and sheep-meat, goats and domestic solipeds. This includes abattoir requirements and provisions on residue testing, the need for each EU member state to draw up lists of approved establishments, stipulating the work of veterinarians in inspecting these and provisions for on-site and post mortem checks.


\(^{24}\) Third country commentators have raised a number of issues in respect of this body of legislation including EU’s approach to risk assessment, lack of technical assistance for third country production, prior warnings and waivers for developing countries, setting of adequate MRLs based on collaboration over Codex standards and setting of MRLs at detectable levels as per international practice.
the production and placing on the market of fresh meat, administrative requirements to be met, residues in poultry meat, the need to establish a list of approved slaughter houses and the carrying out of inspection visits and forms of model health certificates. Chapter III requires that imports must come from approved establishments in approved countries, that (poultry) slaughterhouses must be at least equal in health standards to those in force in the EU, sets down standards for third country cutting plants, cold storage, including hygiene of staff, of premises and equipment, pre-slaughter health inspection and hygiene requirements for slaughter and handling of fresh meat, post mortem inspection and health monitoring storage, packaging and transport.


24. **Council Directive 92/118/EEC** lays down animal health and public health requirements governing trade in and imports into the Community of products not subject to the requirements laid down in specific Community rules referred to in Annex A (I) to Directive 89/662/EEC and, as regards pathogens, to Directive 90/425/EEC as last amended by Directive 97/79/EC. Such products include inter alia milks not for human consumption, animal casings, hides and skins, certain pet foods, bone and bone products, processed animal proteins, blood and blood products, apiculture products and some products made of poultry, game and rabbit. The Directive requires products imported into the EU to come from conforming third country establishments, and be subject to an on-the-spot investigation by EU veterinary staff.

**Note:** Most legislation under headings 14-24 will be merged into the new food hygiene regulations.
Statistical analysis of ACP countries’ exports to the EU by product
Annex D

Guide to statistics in Annex C

Export statistics for ACP countries to the EU have been placed in 9 Product heads (1-9 as below) and 4 Groups (A-D)

- Product 1: Live animals, including poultry and birds (HS Ch 1).
  **Group A: Live Animals**
- Product 2: Meat and meat offal up to an including frozen including animals, poultry, birds, ducks rabbits (HS Ch 2)
- Product 3: Live fish and fish up to and including frozen and dried (HS Ch 3)
  **Group B: Meat and Fish up to and including frozen**
- Product 4: Fruit and vegetables, nuts, coffee and tea and cereals including edible vegetables up to and including fresh dried and chilled (HS Ch 7) edible fruit and nuts up to and including dried (HS Ch 8) coffee, tea and spices (HS Ch 9), cereals and flour (HS Ch 10 and 11) oilseed (HS CH 12) and lac, gums and resins (HS Ch 13) and other vegetable materials products nesoi (HS Ch 14)
- Product 5: Cut flowers in trees and live plants (HS Ch 6)
  **Group C: Agriculture and Horticulture**
- Product 6: Preparations of meat and of fish beyond frozen (HS Ch 16) and dairy including milk and cheese (HS Ch 4)
- Product 7: Sugar and sugar confectionery (HS Ch 17)
- Product 8: Cocoa and cocoa confectionery (HS Ch 18)
- Product 9: Preparations of cereals including pasta, bread and biscuits (HS Ch 19) Preparations of vegetables of fruit and of nuts and of other plants (HS Ch 20) and oils of animals, vegetables and fats including margarine (HS Ch 15)
  **Group D Processed Foodstuffs**
Statistical analysis of ACP countries’ economies – breakdown by economic sector and GDP and employment

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Annex F

Individuals, organisations consulted, and publications researched during the study

Individuals consulted

- Derek Akintade, Policy Division, Department of International Department, London
- Dr Patrick Antoine, Caribbean Regional Negotiating Machinery, Barbados
- Steve Ashley, Plant Health Policy Division DEFRA, York
- Mr H. Belveze, (DG SANCO) European Commission, Brussels
- Pierre Berthelot et al., Commonwealth Secretariat, London
- Mr P. Binard, CIME, Secretariat
- Mr. C. Bowers, Food Standards Agency, UK
- Lucien Brewer, Food Standards Agency, UK
- Ms Georgina Brown, Animal Health & Welfare, DEFRA, York
- Mr Ken Burnett, Chartered Institute of Purchasing & Supply, Stamford, Lincolnshire
- Ms S. Byrne, British Standards Institute UK
- Ms Carmel Cahill, Directorate for Food, Agriculture & Fisheries, Non Members Economies Division, O ECD
- Justin Cartner, Food Safety Network, Guelph, Ontario, Canada
- Ms N. Clarke, Permanent Mission of Barbados, Geneva
- Mr J. Comer, National Dried Fruit Association, London
- Prof. Julia Caswell, University of Massachusetts
- Mr W. Daelman, EU Food Safety Authority, Brussels
- Mr A. Dart, Milk & Milk Products Division, DEFRA
- Dr A. Douat, Ministry of Agriculture and Animal Resources, Côte d’Ivoire
- Mr A. Dryland, Produce Inspection Service, Verzidjen, Netherlands
- Dr. H. Fanny, Ministry of Agriculture and Animal Resources, Côte d’Ivoire
- Mr. R. Griffin, Plant Health, FAO, Rome
- Mr M. Flew, EU Food & Veterinary Offices, Plant Health Origin and Distribution, Ireland
- Mr Chris Gadsden, International Meat Traders Association, London
- Mr N. Garbutt, Eurepgap UK Representative
- Mr D. Gill, British Standards Institute, Chiswick UK
- Ms J. Le Gosles, EU Food Veterinary Office (Fisheries) Grange, Ireland
- Prof. R. Gosling, Centre for International Studies Stanford, USA
- Dr. D. Guenther, Deutsche Gesellschaft fur Technische Zusammenarbeit (GTZ), Eshborn, Germany
- Ms. C. Guichard, COLEACP, Paris
Mr. S.K. Gujudhar, International Trade Centre, Geneva
Mr R. Hardy, The Soil Association, Bristol, UK
Dr V. Hegaty, Institute of Food Law (USA)
Dr S. Henson, University of Guelph, Canada
Mr D. Hirst, COLEACP Droitwich UK
Mr. S. Hutchins, Food (Food of Animal Origin) Veterinary Inspectorate, Grange, Dublin, Ireland
The Secretary, Jamaica Exporters Association
Dr A. Kanoute, Consumers International (Africa) Harare, Zimbabwe
Dr C.J. Kedera, Plant Health Inspection Services, Nairobi, Kenya
Mr P. Kiby, Plant Health Service, Department for Environment, Food & Rural Affairs, York UK
Dr P. Koe, Ministry of Agriculture and Animal Resources, Abidjan, Côte d’Ivoire
Mr J. Knoppers, EU Commission, Brussels
Mr Kuriji, Uganda Fish Packers, Kampala, Uganda
Mr H. Laakso, EU Representation, Guyana
Ms M. Laure, COLEACP representative in Africa
Ms Joanne Mabbott, Ethical Trading Initiative, London EC1
Mr Rod McArthur, Meat & Meat Products, DEFRA, London
Mr P. Mackenzie, Sea Products International, Birmingham, UK
Mr Max Merbis, Centre for World Food Studies, Amsterdam, Netherlands
Mr R. Matipa, COMESA (Agriculture) Lusaka, Zambia
Mr K. Morgan, The Soil Association, Bristol, UK
Dr C. Mosha, Codex Contact Tanzania Bureau of Standards, Dar es Salaam, Tanzania
Dr Hans Murau, European Spice Association
Mr D J. Mwakyembe, Tanzania Bureau of Standards, Ministry of Industry & Trade, Dar es Salaam, Tanzania
Dr C. Mwila, COMESA, Lusaka, Zambia
Mr G. Nettleton, Plant Health Division, DEFRA
Dr S. Nmaburete, Ministry of Industry & Trade, Maputo, Mozambique
Ms C. Nolan, Head of Plant Protection Products Sector, DG Health and Consumer Protection, Brussels
Mr Orlinski, EPPO, Plant Protection Organisation, Paris
Mr A. Palmer, Tesco Supermarket Chain, London UK
Mr K. Patel, UK Food Standards Agency (Veterinary), London
Dr J. Pearson, Office of International Epizooties, Paris
Mr D. Philippe, European Commission “Rapid Alert Scheme for Food and Feed”, Brussels
Mr E. Poudelet, European Commission Biological Risk Unit, Brussels
Ms Susan Prowse, Trade Division, DFID
• Ms Renkins, European Commission SANCO DG Security of Food
• Mrs G. da Silva, Institute for Quality and Standards Maputo Mozambique
• Mr M. Roberts, WTO Committee for SPS, Geneva, Switzerland
• Ms A. Robbins, Ministry of Agriculture, Kingston, Jamaica
• Mr M. Scannell, EU Commission DG SANCO International Food Questions, Brussels
• The Secretary, Sea Fishing Industry Association
• Mr Wayne Seex, National SPS Enquiry Point, DEFRA, London
• Ms M. Sowrey, Department for Environment Food & Regional Affairs, Trade Policy Unit, London
• Mr Jeremy Smith, GAFTA, London EC2
• Mr M. Spence, Caribbean Negotiating Machinery, Christ Church, Barbados
• Dr G. Spiegel and Mr S. Thirkell, Sainsbury Supermarkets Group, London
• Ms G. Stanton, WTO, Geneva
• Ms G. Straszburg, EU Commission (Health Protection & Food Security Division), Brussels
• Mr Kevin Swoffer, British Retail Consortium, London SW1
• Prof. W. B. Traile and Prof. A. Swinbank, Department of Agricultural and Food Economies, University of Reading, UK
• Mr N. Ustun, Eurepgap/ Food Plus G m bH, Cologne, Germany
• Ms S. Raven, Mr P. Von Tros, Milieu Programme, Siertelt, Netherlands
• Mr P. Vallet, Office of the International Epizooties, Paris
• Mr M. Vereecke, EU Commission (Phytosanitary Section) DG 6., Brussels
• Mr M. Weijtens, EU Commission (Biological Risk/ Food Law) Brussels
• Mr G. Warren, British Standards Institute, Chiswick, London
• Ms E. West, EFSS (European Food Safety Inspection Service) Milton Keynes, UK
• Mr C. White, Eurofruit, Nine Elms, London
• Mr A. Wiig, CMI, Norway
• Mr J. Wilson, World Bank, Washington DC, USA
• Mr Calle Wilson, Sainsbury Supermarkets, London

Meetings held
• Mr R. Veelenturf, SGS Agro, Spykenesse, Netherlands
• Ms A. van Beuzekom, Centre for Imports from Developing Countries, Rotterdam, Netherlands
• Mr P. Chotard, Fisheries expert ; Ms H. Dodet, Fruits and vegetables expert, Centre for the Development of Enterprise, Brussels
• Mr G. Stinglamber, Pesticides Initiative Programme, COLEACP, Brussels
• Mr A. Randell (Codex Alimentarius)
• Mr G. Vaast (MRLs)
• Mr J. Makihokkonien (Traceability)
• Mr Jouve (Food Quality/Hygiene)
• Mr E. Butriff (Technical Co-operation)
• Food and Agricultural Organisation, Rome
• Dr O’Connor, O’Connor & Co (European Lawyers), Brussels

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