Commissioner's Decision #1377 Décision du Commissaire #1377

TOPIC: O00, B00, G00 SUJET: O00, B00, G00

> Application No: 2,491,151 Demande no: 2,491,151

# IN THE CANADIAN PATENT OFFICE

### DECISION OF THE COMMISSIONER OF PATENTS

Patent application number 2,491,151 having been rejected under subsection 30(3) of the *Patent Rules*, has consequently been reviewed in accordance with paragraph 30(6)(c) of the *Patent Rules* by a panel of the Patent Appeal Board and the Commissioner of Patents. The recommendation of the Board and the decision of the Commissioner are as follows:

Agent for the Applicant SMART & BIGGAR 55 Metcalfe Street, Suite 900 PO Box 2999 Station D K1P 5Y6

#### INTRODUCTION

- [1] This recommendation deals with a review of the rejection under subsection 30(3) of the Patent Rules of patent application no. 2,491,151 entitled "ADVERTISING TRAYS FOR SECURITY", filed on July 2, 2003. The Applicant is SECURITY POINT MEDIA and the inventor is Joseph T. Ambrefe.
- [2] The present application relates to a method of moving trays containing personal belongings through a security checkpoint, such as that of an airport.
- [3] For the reasons that follow, we recommend that the claims proposed by the Applicant be substituted for those on file and that the application thereafter be allowed.

### **PROCEDURAL HISTORY**

- [4] The present application, filed under the provisions of the Patent Cooperation Treaty, claims priority from a US application filed July 3, 2002, this being the effective claim date for the purposes of assessing obviousness under section 28.3 of the *Patent Act*.
- [5] The application was rejected in a Final Action dated November 23, 2012 on the grounds that the pending claims would have been obvious and that they were directed to an unpatentable aggregation.
- [6] In response to the Final Action, the Applicant made amendments to the description and claims on May 27, 2013. The Applicant also presented arguments in favor of the nonobviousness of the claims, including arguments relating to factors to be considered in the obviousness assessment.
- [7] The case was forwarded to the Patent Appeal Board ("PAB") on July 17, 2013 along with a Summary of Reasons ("SOR") outlining why, in view of the Applicant's arguments and

amendments to the application, the Examiner considered the claims to be obvious. This panel was formed to perform a review under paragraph 30(6)(c) of the *Patent Rules*.

- [8] The SOR was forwarded to the Applicant on August 8, 2013 along with an invitation to a hearing.
- [9] Prior to the hearing, the panel, in a letter dated May 28, 2014 and in accordance with section 30(6.1) of the *Patent Rules*, notified the Applicant of additional defects in the application relating to the clarity of the claims and their utility. We also provided an outline of our preliminary obviousness analysis under the four-step approach set forth in *Apotex Inc. v. Sanofi Synthelabo Canada Inc.*, 2008 SCC 61 [*Sanofi*] and invited the Applicant to provide further submissions, including any documentation relevant to factors to be assessed in relation to the obviousness issue, as identified in their submissions of May 27, 2013.
- [10] In response, the Applicant, in a submission dated September 17, 2014, provided proposed claims 1-15 and a proposed change to page 6 of the description. In our view, proposed claims 1-15 overcome the two defects of claim clarity and utility identified by the panel.
- [11] To support the non-obviousness of the claims, in the submission of September 17, 2014 the Applicant provided additional arguments and documentation. The documentation included declarations from Joseph T. Ambrefe Jr., the inventor, and Marcus Arroyo, an individual with experience in airport security screening checkpoint operations. These declarations were accompanied by exhibits, such as security checkpoint design guidelines and communications from people working in the security screening checkpoint field. This documentation had also been submitted in the context of an earlier US re-examination proceeding involving the corresponding US patent.
- [12] On September 22, 2014, the Applicant provided certain exhibits, which were referenced but not included in its September 17, 2014 submissions.

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- [13] Regarding the issue of unpatentable aggregation, the Examiner brought Commissioner's Decision no. 1361 to the attention of the Applicant and the panel during the hearing held on September 26, 2014. Ultimately, the panel found that the aggregation issue was moot.
- [14] The Applicant raised another issue in response to the Final Action, namely that the issuance of the Final Action was improper; however, this issue was eventually dropped by the Applicant.

### ISSUE

[15] The only issue left to be resolved is whether the proposed claims would have been obvious. However, before any such assessment of patentability, it is first necessary to construe the claims (*Whirlpool Corp. v. Camco Inc.*, 2000 SCC 67 at para 43). Below we set out the principles we have applied for both claim construction and obviousness.

#### LEGAL PRINCIPLES

### **Claim construction**

- [16] Purposive construction identifies those features that are considered to be essential and those that are considered to be non-essential (*Whirlpool, supra* at para. 45). This identification is performed from the point of view of the person skilled in the art, who possesses the common general knowledge of the relevant art (*Free Word Trust v. Électro-Santé Inc.*, 2000 SCC 66 at para. 31 [*Free World Trust*]).
- [17] The skilled person through whose eyes the claims are to be viewed is unimaginative; however, he or she is deemed to be reasonably diligent in keeping up with advances in the field to which the patent relates. This person of ordinary skill in the art (POSITA) is deemed to be sufficiently versed in the art to which the patent relates to enable him or her to appreciate the nature of the invention and is deemed to be aware of those relevant

patents and publications that would be discoverable in a reasonable and diligent search (*Newco Tank Corp v Attorney General of Canada*, 2014 FC 287 at para 28).

- [18] In order for an element of a claim to be considered non-essential it must be shown either (i) that on a purposive construction of the words of the claim it was clearly not intended to be essential or (ii) that at the date of publication of the patent, the skilled addressee would have appreciated that a particular element could be substituted or omitted without affecting the working of the invention (*Free World Trust* at para. 55).
- [19] In Office Patent Notice PN 2013-02 it is specified that elements must be determined to be essential or non-essential based on the identified problem and solution, which takes into account the whole of the application.

### Obviousness

[20] Section 28.3 of the *Patent Act* sets out the conditions under which a claim may be found to be obvious:

**28.3** The subject-matter defined by a claim in an application for a patent in Canada must be subject-matter that would not have been obvious on the claim date to a person skilled in the art or science to which it pertains, having regard to

(a) information disclosed more than one year before the filing date by the applicant, or by a person who obtained knowledge, directly or indirectly, from the applicant in such a manner that the information became available to the public in Canada or elsewhere; and

(b) information disclosed before the claim date by a person not mentioned in paragraph (a) in such a manner that the information became available to the public in Canada or elsewhere.

- [21] In *Sanofi* the Supreme Court of Canada put forward a useful four-step approach to performing the obviousness assessment:
  - (1) (a) Identify the notional "person skilled in the art";

- (b) Identify the relevant common general knowledge of that person;
- (2) Identify the inventive concept of the claim in question or if that cannot readily be done, construe it;
- (3) Identify what, if any, differences exist between the matter cited as forming part of the "state of the art" and the inventive concept of the claim or the claim as construed;
- (4) Viewed without any knowledge of the alleged invention as claimed, do those differences constitute steps which would have been obvious to the person skilled in the art or do they require any degree of invention?
- [22] Some factors which may be relevant at step (4) of the *Sanofi* assessment are set out in *Novopharm Ltd. v. Janssen-Ortho Inc.*, 2007 FCA 217 at para. 25, *Jay-Lor International Inc. v. Penta Farm Systems Ltd.*, 2007 FC 358 at para. 91, *Diversified Products Co. v. Tye-Sil Corp.* (1991), 35 CPR (3d) 350 (FCA) at 368 and *Beloit Canada Ltée/Ltd. v. Valmet Oy* (1986), 8 CPR (3d) 289 (FCA) at 296. See also *Re Application No. 2,286,794* (2012), C.D. No. 1325 (P.A.B. and Commissioner of Patents) at paras. 51-57 (aff'd 2014 FC 861) and *Re Application No. 2,269,368* (2014), C.D. No. 1360 (P.A.B. and Commissioner of Patents) at paras. 76-87.

# ANALYSIS

## **Claim construction**

- [23] In our letter of May 28, 2014, the panel advised the Applicant that the claims would be construed in accordance with Office Patent Notice PN 2013-02. In the submissions of September 17, 2014, the Applicant did not make any comment in this regard. At the hearing the Applicant indicated that their view was that all of the features of the claims were essential.
- [24] We begin with an analysis of proposed claim 1, which is the only independent claim.
- [25] Proposed claim 1 provides:
  - 1. A method comprising

positioning a first tray cart containing a plurality of trays at a proximate end of a scanning device through which objects may be passed, wherein said scanning device comprises said proximate end and a distal end, and said scanning device is located at a security checkpoint,

removing a tray from said first tray cart,

passing said removed tray through said scanning device from said proximate end through to said distal end,

providing a second tray cart at said distal end of said scanning device for receiving said removed tray,

receiving, from a person, said removed tray passed through said scanning device in said second tray cart, wherein removed trays passed through said scanning device are nested with each other in said second tray cart, and moving said second tray cart to said proximate end of said scanning device so that trays in said second tray cart can be removed and passed through said scanning device at said proximate end,

wherein said plurality of trays are nestable trays that comprise an interior bottom surface and sides, wherein said nestable trays each comprise information displayed on said interior bottom surface.

#### The person skilled in the art

- [26] The Final Action characterized the skilled person as a team "including management and operations personnel in an industry involving cargo and baggage handling" and "those with a background in the area of industrial engineering known as operations research – maximizing efficiency of actions involved in accomplishing repetitive tasks involving people and material."
- [27] In its submissions of May 27, 2013 and during the hearing, the Applicant contended that the skilled person identified in the Final Action was from a very different field from that of the invention, and argued that the appropriate person skilled in the art would not have knowledge of cargo and baggage handling networks nor knowledge of advanced mathematical methods used to maximize operational efficiency as would be possessed by someone with a background in operations research.

- [28] In our letter of May 28, 2014, the panel suggested that the person skilled in the art would be appropriately characterized as "a person skilled in the art of security screening, as may be found in airports."
- [29] At the hearing dated September 26, 2014, the Applicant submitted that the skilled person was "a person experienced in security checkpoint operations." We agree with this characterization given the context in which the claimed method is practised.

### The relevant common general knowledge

- [30] In our letter dated May 28, 2014, we set out what we proposed to have been the relevant points of common general knowledge of the skilled person at the relevant date and invited the Applicant to make submissions on these points. No submissions on these points were provided with the submissions of September 17, 2014, but the Applicant reserved the right to make additional submissions at the hearing. Our proposed points of common general knowledge were set out as:
  - (a) Knowledge of typical security procedures and equipment used in secure checkpoints, including x-ray machines, particulate matter sensors, conveyor belts, etc.
  - (b) Knowledge of loose items being typically removed from pockets and placed in a tray to be hand checked or machine checked (by personnel or x-ray, etc.)
  - (c) Knowledge that the trays used may be non-standardized, smaller ones used for items such as wallets, keys, etc., larger ones used for laptops, cameras, etc.
  - (d) Knowledge of the use of carts or dollies as wheeled structures for the transport of materials by an individual (more generally, even by those not skilled in the particular art)
  - (e) Knowledge of the prevalence of advertising material in public areas, such as airports; and
  - (f) Knowledge of the use of nested trays at security checkpoints for conveying personal belongings to be screened
- [31] At the hearing the Applicant disputed only point (f).

- [32] Upon a review of the application itself, it is not clear from the background discussion in the application that the use of nested trays at security checkpoints was part of the common general knowledge of the skilled person. The application does discuss the problem of non-standardized trays at para. [0004]. Although at least some of the trays previously used at security checkpoints might have been nestable, there is no suggestion of nesting trays at a security checkpoint, and a skilled person would understand that trays used at such a location could have been nestable or not.
- [33] Upon our review of the record, we agree that there is no explicit indication in any of the documents that demonstrates that the use of nestable trays at a security checkpoint was part of the common general knowledge of the skilled person. Although there is some mention of the use of trays in a document submitted by the Applicant, there is no indication that those trays were nestable.
- [34] However, we note that this does not mean that nestable trays were not known more generally outside of this art. We therefore conclude that the common general knowledge includes points (a) to (e), and (f) modified as follows:
  - (f) Knowledge of the general use of nestable trays, though not specifically in security checkpoints.

## The problem to be solved and the solution provided

- [35] In the background discussion of the application's description, at pages 1-3, typical security areas are presented. Such areas comprise an entrance and exit between which are located one or more screening areas. The screening areas can include scanning devices such as xray machines and/or manual inspection areas.
- [36] At the time of the application, any personal belongings carried by a person passing through such areas were typically placed in some sort of tray which was then manually inspected and/or passed through a scanning device. After passing through a device such as a metal

detector, the person retrieved his/her personal belongings from the tray, which had been separately inspected.

- [37] This process necessitated the cycling of trays from one end of the area to the other as the trays were depleted from the entrance side and accumulated at the exit.
- [38] According to the application at para. [0004], the trays used in such an environment were small non-standardized trays, resulting in problems relating to storage and making them unsuitable for containing the various items carried by members of the public passing through such areas.
- [39] Also, according to the application at para. [0006], there was no system for transporting, storing and organizing the trays, which made their use cumbersome. According to the record<sup>1</sup>, this led to regular injuries among security checkpoint personnel in carrying stacks of trays around the screening area.
- [40] The Applicant at para. [0008] of the description points to a need for improving the movement of trays around a security checkpoint, allowing for more efficient utilization, gathering and storage of them. The description at para. [0009] also points to a need for easier transportation of trays, as well as the desire for uniformity from airport to airport (para. [0010]), so as to assist in the efficient movement of passengers.
- [41] From the above, the skilled person would understand that the problem to be addressed is to overcome the difficulties in moving trays through security checkpoints (including those relating to storage, difficulty in use and rate of injury) in order to provide a more efficient movement of trays and, as a consequence, people, through a security checkpoint.
- [42] The solution to the above problem is a method incorporating nestable trays and first and second carts to transport the trays around the security checkpoint.

<sup>&</sup>lt;sup>1</sup> See e.g., the declaration of Marcus Arroyo at para. 70 and accompanying Exhibit F at page 26, as well as Exhibit 16 to the declaration of Joseph T. Ambrefe

### The essential elements of proposed claim 1

- [43] With respect to the phrase "wherein said nestable trays each comprise information displayed on said interior bottom surface", while we appreciate the Applicant's point that if the process is made more efficient, passengers are more likely to have a positive experience and more likely to respond positively to information or advertising on the trays (see submissions of May 27, 2013 at page 7 and submissions of October 10, 2014), this result is only important to the marketing of the products displayed on the trays. The fact that information is displayed on the bottom interior surface of the trays has no material effect on the mechanical process of moving the trays and transporting them by use of the carts. Any gains in efficiency as a result of the method are due to the method of using the carts and trays, not due to the display of information on the trays.
- [44] We therefore conclude that the display of information on the interior bottom surface of the trays is a non-essential element of proposed claim 1. As such, it is not necessary to address the issue introduced in the Final Action of whether or not the claim is directed to an unpatentable aggregation.
- [45] The remaining elements of proposed claim 1 directly relate to the use of the tray and cart method in order to increase the efficiency of the screening process at a security checkpoint. The essential elements of proposed claim 1, summarized for convenient reference, are therefore:
  - (a) the step of positioning of the tray cart containing nested trays at the proximate end of a scanning device at a security checkpoint
  - (b) the step of passing a tray taken from the tray cart through the scanning device
  - (c) the subsequent step of, once the scanning process is complete, nesting the used trays on a second cart located at the distal end of the scanning device, and
  - (d) the step of transporting the second cart with the nested trays back to the proximate end of the scanning device to replenish the tray supply.

#### **Obviousness**

[46] Below we set our analysis applying the *Sanofi* approach to proposed claim 1.

(1)(a) Identify the notional "person skilled in the art"

- [47] The person skilled in the art was set out at para. [29].
- (1)(b) Identify the relevant common general knowledge of that person
- [48] The relevant common general knowledge was set out at para. [30], with the modification as set out at para. [34].
- (2) Identify the inventive concept of the claim in question or if that cannot readily be done, construe it
- [49] Considering the problem to be solved, the solution to the problem and our view of the essential elements of proposed claim 1, in this case we see no reason why the inventive concept is something more or less than the essential elements. We therefore take the inventive concept to be comprised of elements (a) to (d) specified in para. [45] above.
- (3) Identify what, if any, differences exist between the matter cited as forming part of the "state of the art" and the inventive concept of the claim or the claim as construed
- [50] The Final Action cited two documents in combination with the common general knowledge to show that claim 1 was obvious, namely D1 (International Patent Application WO02/29744 to Brunetti, published April 11, 2002) and D2 (US Patent no. 5,388,049 to Sansone et al., published February 7, 1995).

#### D1 (Brunetti)

- [51] D1 relates to an ingress/egress control system for airport security checkpoints. The area comprises a plurality of portals or archways that passengers enter in order to proceed to a secure area before arriving at a particular gate through which they will board a plane. Each portal is wide enough for only one person to pass through, with a magnetometer encased by the portal.
- [52] Each portal area also includes a conveyor upon which people place their luggage and other articles for x-ray inspection. The system provides for small trays 29 (see Figure 3 of D1) to be used for small items such as keys or coins. Such trays are dispensed via chutes adjacent each conveyor and are continually supplied from the back by screening personnel (see D1 at page 10, lines 27-30).
- [53] As conceded in the Final Action at page 4 and noted by the Applicant in the submissions of May 27, 2013, D1 does not disclose or suggest the use of carts to move the trays between the entrance and exit of the security checkpoint and so cannot disclose the steps of proposed claim 1 that use such carts. D1 also does not disclose or suggest the nesting of trays for transport and storage on the carts. D1 discloses the use of a chute to which the small trays are continually fed by screening personnel. As illustrated in Figure 3 of D1, the trays appear to be fed individually through the chute given their depiction within the chute.

#### D2 (Sansone et al.)

[54] D2 relates to a system and method for monitoring value mail, such as that relating to the sending of credit cards to a customer. Trays are filled with such mail destined for a particular location. The trays are labelled and placed into a sleeve, the trays and sleeve then weighed. After a dispatch and routing tag is placed on the sleeve, the sleeved trays are collected in cages and then the cages are placed on a transport vehicle, such as a truck.

- [55] The trays and cages are not depicted in the patent. The cages are described as "any kind of movable container that will hold a large number of trays for subsequent conveyance, thirty three trays being the maximum number to cage." The trays and cages are disclosed as being used to ship the mail to a remote distributor. They are filled with mail and shipped via the cages.
- [56] D2 does not disclose the steps of proposed claim 1, where the trays are cycled from a proximate end of a scanning device to a distal end and back via first and second tray carts. The method described in D2 is one-way. Further, there is no disclosure of movement of empty trays around a scanning area, such as that of a security checkpoint. In D2 only the movement of full trays is described in the context of a one-way method. Also there is no nesting of trays in relation to their use and since the configuration of the trays is unknown, it is impossible to know whether such trays could even be nestable.

#### Other Documents

- [57] While other documents were referenced in the Final Action, they were only considered in light of the subject matter of the dependent claims. Accordingly, they need only be considered if proposed claim 1 is found to be obvious.
- [58] At the hearing the Applicant noted that in the SOR, an additional document was applied, namely International Application no. WO9003140. The document was introduced to address an amendment to claim 13 on file, which limited the scope of information displayed at an airport security checkpoint to advertising in particular. This issue is not relevant to proposed claim 1, and in any case is moot given our construction of proposed claim 1 and our determination that such information is non-essential.

#### Summary of Differences

- [59] Having considered D1 and D2 we conclude that the differences between the state of the art and the inventive concept of proposed claim 1 are all of the essential elements of proposed claim 1.
- (4) Viewed without any knowledge of the alleged invention as claimed, do those differences constitute steps which would have been obvious to the person skilled in the art or do they require any degree of invention?
- [60] In determining whether an invention is obvious or requires a degree of invention, we are guided by *Canadian Gypsum Co. v. Gypsum, Lime & Alabastine, Canada Ltd.*, [1931] Ex. C.R. 180 at 187 (see also *Shell Oil Co. v. Canada (Commissioner of Patents)* (1982), 67 C.P.R. (2d) 1 (SCC) at 12-13) for the principle that inventive ingenuity may be found in the underlying idea, or in the practical implementation of that idea, or in both. In the present case the person skilled in the art would consider that there is no inventive ingenuity in applying the method proposed once it has been conceived. However, there is nothing in the record before us that indicates that the conception of the invention in this case would have been obvious.
- [61] We acknowledge that given the known inefficiencies in the screening process, the necessity to move the trays, and the known injuries of screening personnel due to manual transport of trays, *in hindsight*, a logical argument could be made that the skilled person would have made the choice to use some type of method, such as the use of a cart, to move the trays to avoid such problems at a security checkpoint. However, courts have cautioned against the use of hindsight in assessing the inventive ingenuity of a patent (*Beloit, supra* at 295).
- [62] In the present case, nothing in the record indicates that it would have been obvious to a skilled person to conceive of the carts and trays method of proposed claim 1. On the contrary, we are of the view that arriving at the inventive concept, in light of the state of

the art and the common general knowledge, would have required a degree of invention. This is supported by our review of the documentation provided by the Applicant and our view that to the extent that the obviousness factors may be considered relevant in the present circumstances, they support the conclusion that the invention would not have been obvious.

- [63] The documents submitted by the Applicant in relation to the factors that may be relevant at step (4) of *Sanofi* include declarations and accompanying exhibits from Joseph T. Ambrefe, Jr., the inventor, and Marcus Arroyo, a person stated to have extensive experience in the field of airport security<sup>2</sup>. Given Mr. Arroyo's background we take his statements to be informative in respect of the person skilled in the art, based on our characterization of such a person.
- [64] Below we consider the factors set out earlier at para. [22] in light of the declarations and accompanying exhibits of Mr. Ambrefe and Mr. Arroyo.

## The climate in the relevant field at the time of the invention

- [65] Having reviewed the record, particularly paras. 21-23, 32-33, 35 and 63-65 of the declaration of Mr. Arroyo and the accompanying Exhibit B entitled "*Recommended Security Guidelines for Airport Planning, Design and Construction*", June 2001, we conclude that the climate was such that the skilled person would have been resistant to introducing at the time of the invention the use of further equipment such as standardized trays and carts into a security checkpoint screening operation such as that at an airport. The introduction of such equipment would have been counter-intuitive, given the "against the stream" nature of the movement of loaded tray carts from a secure side of the checkpoint to a non-secure side and given the desire to minimize the impact of security operations on the cost of airport operations.
- [66] This factor weighs in favor of the non-obviousness of proposed claim 1.

<sup>&</sup>lt;sup>2</sup> see declaration of Marcus Arroyo submitted September 17, 2014 and Exhibit A – Career Biographical Summary

The motivation to solve a long-felt need in existence at the time of the alleged invention and attempts at addressing it

- [67] Having reviewed the record, particularly paras. 57-60 of the declaration of Mr. Arroyo and Exhibit 17 accompanying the declaration of Mr. Ambrefe, we conclude that at the time of the invention there was a general motivation to solve long-known problems of lack of efficiency of security checkpoint screening operations and screening officer distraction caused by the lack of a system for efficiently moving trays through the security screening process. Time and effort was expended by screening officers in organizing and moving trays around the checkpoints, reducing the effectiveness of such officers in the screening process.
- [68] We also conclude, based on para. 70 of the declaration of Mr. Arroyo and the accompanying Exhibit F, that past attempts to address these problems were unsuccessful, the past attempts having included:
  - an overhead tray return system
  - a roller-slide system
  - pushing trays across the floor
  - a mechanical tray return system that passed trays underneath the X-ray machine, and
  - manual lifting of the trays (which caused injuries to screening personnel and inefficiencies due to the gathering and moving of the trays by the personnel).
- [69] This factor weighs in favor of the non-obviousness of proposed claim 1.

## Amazement expressed by those in the art field

[70] Having reviewed the record, particularly paras. 11-13, 20-23 of the declaration of Mr.Arroyo and the accompanying Exhibits 14 and 16, we conclude that the merits of the carts

and trays method were not immediately recognized by those skilled in the art and that it was only after a demonstration of the method and later pilot program (years after the invention was first proposed to those in the art field, which itself was after the present claim date) that those skilled in the art recognized its benefits. In fact, the level of reduction in worker injuries and increase of throughput at checkpoints was surprising. A statement taken from Exhibit 16 to Mr. Ambrefe's declaration, which is a letter dated September 5, 2006 from Federal Security Director of Los Angeles Airport, Lawrence Fetters, to Lydia Kennard, Executive Director, Los Angeles Airport, is illustrative of the unexpected results of the use of the carts and trays method:

Having the system in place for almost two months, we are very pleased with all attributes of the program. In fact, it is difficult to imagine going back to the way checkpoints were in the past. All feedback from travellers, TSOs and airlines has been positive. Indeed, this program has become a model for large airports throughout the nation.

- [71] The unexpected nature of the level of the increase in throughput efficiency is also confirmed by Mr. Arroyo at para. 61 of his declaration.
- [72] This factor weighs in favor of the non-obviousness of proposed claim 1.

#### Imitation and adoption of the invention

- [73] Having reviewed the record, particularly para. 10 of the declaration of Mr. Arroyo and accompanying Exhibits B, C, D, E and F, as well as para. 35 of the declaration of Mr. Ambrefe and accompanying Exhibits 12, 13, and 28-30, we conclude that the later recognition of the merits of the invention by those skilled in the art is reflected by the subsequent adoption and imitation of it by them.
- [74] As noted by Mr. Arroyo, the adoption of the claimed carts and trays system in the US can be traced by reviewing the evolution of the published airport design guidelines (Exhibits B-F noted above), which indicate that having seen the benefits of the method of the present invention through testing and pilot programs, those skilled in the art formally

recommended its adoption in 2009. It was also only at this point that the manual transport of bins (i.e., trays) with the associated worker injuries was specifically "no longer endorsed".<sup>3</sup>

[75] This factor weighs in favor of the non-obviousness of proposed claim 1.

# Commercial success

- [76] Commercial success may in some cases support inventive ingenuity; however such an effect may be due to marketing skills and features other than the invention. (*Creations 2000 Inc. v. Canper Industrial Products Ltd.* (1988), 22 CPR (3d) 389 at 404 (FC), aff'd (1991) 34 CPR (3d) 178 at 183 (FCA)).
- [77] In this case, the panel concludes that this factor is of no assistance in the obviousness determination.
- [78] Having reviewed the record, particularly paras. 2 and 36-39 of the declaration of Mr. Ambrefe, we are unsure as to whether the commercial success of the invention is attributable to the merits of the claimed method. The reason is that the business plan associated with the invention involves the supply of equipment by the Applicant to an airport at no cost in exchange for the ability to sell advertising space on the trays. On the one hand the commercial success could support the non-obviousness of the claim. On the other hand, at least a portion of the commercial success could be due to the marketing of the process and associated equipment with no cost to the user.

## CONCLUSIONS

[79] There is nothing in the record which assists the skilled person in bridging the differences between the state of the art and the inventive concept of proposed claim 1. Further, the

<sup>&</sup>lt;sup>3</sup> See Exhibit F to the declaration of Marcus Arroyo at Section 2.3

factors assessed above collectively support the non-obviousness of the claimed invention to the skilled person.

- [80] Based on the record before us, which includes documentation and argument which was not before the Examiner during prosecution, at the claim date, those skilled in the art faced several challenges, including a known lack of efficiency in the security screening process and a known problem with worker injuries due to tray transport, and despite the motivation to address such issues, they did not conceive of the method claimed. Further, despite the efforts of the Applicant through proposals, demonstration, and a pilot program, those skilled in the art did not adopt such a process until at least six years after the claim date of the present application.
- [81] We find the statement by Hugessen J. in *Beloit, supra*, apt in the present case to summarize our conclusions:

While none of these factors taken in isolation is necessarily determinative on the issue of obviousness, each of them argues more eloquently than any ex post facto analysis can ever do that the patent is inventive; cumulatively their effect is simply irresistible.

- [82] We conclude that proposed claim 1 would not have been obvious and would have required a degree of invention. It is therefore compliant with section 28.3 of the *Patent Act*.
- [83] It follows that proposed claims 2-15, all of which depend directly or indirectly on claim 1, are also compliant with section 28.3 of the *Patent Act*.

# **RECOMMENDATION OF THE BOARD**

- [84] In view of the record, on the facts of this case, we recommend that the Applicant be notified pursuant to subsection 30(6.3) of the *Patent Rules* that the following amendments are necessary for compliance with the *Patent Act* and *Patent Rules*:
  - Deletion of claims 1-14 on file
  - Insertion of claims 1-15 as proposed in the submissions dated September 17, 2014.

Stephen MacNeil Member Paul Fitzner Member Michael O'Hare Member

# **DECISION OF THE COMMISSIONER**

- [85] I concur with the conclusions and recommendation of the Patent Appeal Board. In accordance with subsection 30(6.3) of the *Patent Rules*, I hereby notify the Applicant that for compliance with the *Patent Act* and *Patent Rules*, the following amendments must be made within 3 months, failing which I intend to refuse the application:
  - Deletion of claims 1-14 on file
  - Insertion of claims 1-15 as proposed in the submissions dated September 17, 2014.
- [86] Therefore I invite the Applicant to make these amendments, and only these amendments, under paragraph 31(*b*) of the *Patent Rules*.

Sylvain Laporte Commissioner of Patents

Dated at Gatineau, Quebec, this 25<sup>th</sup> day of February, 2015