Class of 65 Newsletter Bulletin d'Information—Classe de 65

Issue/Numéro 104



September/septembre 2017

Disclaimer: This Newsletter is produced for members of the RMC Class of 1965 and is based primarily on inputs from members of the Class of 65. It is not an official publication of the Royal Military College nor does it purport to represent the views or opinions of all members of the Class. Unfortunately, the Editorial staff lacks the linguistic skills to produce a bilingual version. Items are published in the official language in which they are received.

Editor's Corner/Coin du rédacteur

Lots of stuff this month thanks to several active pens. Andy Nellestyn has provided thoughts on a personal epiphany that is very pertinent at the present time. George Brown sent some notes on a recent cruise, and Gord (Navy) Forbes has submitted a couple of personal anecdotal articles. Finally, Gerry Mueller has shared the second part of his Antarctica/South America Odyssey. Before getting there however, a short note on Ed Sanford's memorial service.

Farewell to 6568 Ed Sanford

A Memorial service was held in Ottawa on 9 September to honour and remember classmate **6568 Ed Sanford** who passed away on 16 July 2017 after a lengthy illness. The ceremony was attended by a large crowd of family, friends and former colleagues who packed the chapel and the reception hall following the service.

The first to speak of their memories of Ed was Class of 65 member **6539** Nigel Hilliard who provided some amusing anecdotes of adventures that he and Ed shared during their college days. Nigel had made the long trip from Collingwood to attend the ceremony.

In addition to Nigel, the Class of 65 was well represented by seventeen other members of the class. They were all grateful to Sharon and to the rest of Ed's family for providing this opportunity to say farewell to him.



September/septembre 2017

Page 2

A Personal Epiphany by 6560 Andrew Nellestyn

Some years ago on a visit to the Santa Institute, I had the opportunity to go up to Los Alamos, a research, development and testing facility for the Manhattan Project (MP). It was an epiphany much like that of Saul - subsequently Paul - on the road to Damascus. It changed me profoundly in ways that still confound me.

The recent quests to deny Iran and North Korea a nuclear capability drove me to read once again Joseph Kanon's novel *Los Alamos* and Michael Frayn's *Copenhagen*.

The Manhattan Project (MP) was not merely another inevitable link in chain of the evolution of technology and its application to weaponry: "A sharper spear. A better bow and arrow." The atomic bomb was "Not just a weapon." It was "Annihilation. Nothing else." Never in history had it been envisioned nor intended to create and embrace a "gadget" - the MP code word to which it was referred by the scientists at Los Alamos - that had the power to obliterate, annihilate the world and humanity. It fundamentally and irreversibly changed society and the conduct of international relations.

The deadly power of the atom and the attempt to harness and exploit its immense destructive power were not pursued just by the Nazis. The Russians, the Americans, the British and, ironically, the Japanese among other nations, were conducting research and experiments to unleash the massive explosive energy of the atom. It was a race, begun before WWII, to be the first to weaponize nuclear energy: a race in which the winner would deny the losers the key to unlock, split, the nucleus.

This is not to say that every scientist and proponent were not sensitive to and troubled by the moral and ethical dimensions of such annihilating power. They envisaged the coming of the age of nihilism. Appeals were made by Einstein and Oppenheimer (scientific leader of the MP) and other scientists to both Presidents Roosevelt and Truman to ban the atomic bomb and arrest its use.

Indeed many hailed the splitting of the atom as the path to world peace, prosperity and health such as President Eisenhower's Atoms for Peace program in which, for example, commercial nuclear power plants would provide: cheap (some even surmised free) electricity; irradiated seeds and produce would eliminate hunger; and medical radioactive isotopes would detect and treat cancer and other life threatening diseases.

International conventions and agreements such as the nuclear Non-Proliferation Treaty (NPT), the Nuclear Suppliers Group (NSG) agreement and nuclear disarmament/reduction/atmospheric testing treaties were enacted. The Bulletin of Atomic Scientists (introduced the Doomsday Clock to focus attention on and assess the possibility of Atomic Armageddon), the Pugwash Conferences, the Campaign for Nuclear Disarmament (CND) and other protest and peace movements were established to reduce, preferably eliminate, the risk of recourse to nuclear weapons in warfare. Sadly all have failed in keeping the world free of nuclear weapons and in preventing the entry of new nuclear capable states. And regrettably but realistically, the NPT is dead. It never had a chance!

Fear once more seizes an anxious world as more nations such as Iran and North Korea take steps to acquire nuclear arsenals. Those who already possess them, and their allies, threaten conventional or nuclear



September/septembre 2017

Page 3

A Personal Epiphany (continued)

retaliation and financial and economic sanctions, if new nuclear aspirants don't cease their nuclear programs. Bomb shelters have come back in fashion as have safety drills and storage of food, water and medical supplies.

The world has become a dystopian place. Climate change is a worrying and existential threat to our survival. Natural disasters appear to be more frequent and certainly devastating. Incivility, discord, division, intolerance and violence run rampant. Our systems of government are suspect as they are judged to fall short of ensuring and protecting stability, security, prosperity, equality, dignity, the rule of law, freedom and human rights.

So what to do? This remains the imponderable dilemma facing humanity. A cornucopia of ideas has been proposed to address this conundrum, many of which have merit, are well-intended, practical and realistic. And some are not. Our systems and philosophy of government are in flux and must evolve and be developed honestly, openly, justly, constructively, with integrity, wisdom and civility and without rancor, intolerance and prejudice. Governments derive their legitimacy from the people they represent. Governance is, and must be, an interactive and participatory dialogue involving all stakeholders - elected and the electorate. Presently such dialogue is effectively absent and thus often fails this fundamental aspect of democracy. International institutions need to be revisited with regard to purpose and structure to better reflect and anticipate a changing world order, society, values, aspirations and the impact of technology. Peaceful, constructive and progressive conflict resolution must always be the primary guiding principle at the personal, community, national and international levels.

The storied Biblical personage King Solomon approached each issue imbued with and guided by the attribute of wisdom - the whole is preferable to two functionless halves, possession and compassion best operate in balance.

Justice and citizenship are compelling and positive time-tested virtues and play major roles in the creation and maintenance of harmonious civilizations and compassionate human interactions. Two books both serendipitously published in 1990 serve as testimony to adherence to and respect and utility of values:

A Passion for Justice: Emotions and the Origins of the Social Contract by Robert C. Solomon (a descendant of the Jewish Biblical and historical King?)

Citizenship: The Civic Ideal in World History, Politics and Education by Derek Heater

I often ponder upon my own contradictions as these relate to the question of nuclear energy and peace. I did my PhD in nuclear studies, taught nuclear technology and served as a senior corporate executive in the nuclear industry and was involved in arms sales. I participated in COCOM and IAEA meetings. Yet concurrently championed and participated in arms control, human rights, peacekeeping, equality and economic development and reconstruction in developing countries. My visit to Los Alamos was indeed an epiphany which affected me deeply and profoundly and, while still not entirely revealed and comprehended, did simultaneously temper and broaden my appreciation of unfettered technological advances.



September/septembre 2017

Page 4

Back to the Maritimes and Bermadoo by 6598 George Brown

This Easter we took a cruise through Quebec, the Atlantic Provinces and on to Bermuda. These were places where I lived or visited many years ago. In the case of Bermuda, we would go there in the winter to paint ship, when it got too cold in Halifax.

I now live in the Brussels area in Belgium but we visit Canada regularly. We welcomed the opportunity to do a cruise with a group of old friends from Calgary, most of whom had never visited the Maritimes.

We had only a few hours in each of the ports between Quebec and Boston, but we felt we had enough time to see the highlights of each. In Halifax, Bonnie and Roger Chiasson, our upcoming Tokyo Tour organizer, met us at the pier and we drove down to Grand Pre and the Gaspereau Valley for a very pleasant lunch. When the ship left Boston, we were pleased to find, totally by chance, that Pat and Tony Goode, our Club Pres., had joined the ship. We sailed on to Bermuda for a three day visit and returned to Boston.

Great meals, good entertainment, relaxing but exciting. We recommend a floating 5 star hotel to see new places as well as old haunts, and I firmly believe that sailing on a cruise ship is even better than a destroyer or frigate.

And you never know when you will meet another 65'er along the way !









September/septembre 2017

Page 5

The League of Mature Gentlemen by 6533 Gord Forbes

We gentlemen are not old. We are mature. But we all must admit that sometimes maturity brings things like aches and pains. For some strange reason our bodies don't quite respond the way they used to. Old injuries show up in more focus. New aches arise for seemingly no reason. Sometimes maturity can hurt.

And so, I must admit to some soreness myself, mostly one knee and one shoulder. So I'm always looking for some way of alleviating the pain. And I have tried many.

I tried over-the-counter pain pills which give some temporary relief, but they wear off too soon. It helped a bit to get to sleep at night, but that was about it.

I tried physiotherapy, but that sometimes led to more pain than it relieved. And besides, there is only so much of it covered by health insurance.

"Why don't you try exercise" said someone. So I tried exercise and it seemed to feel good . . . while I was exercising. But as soon as I finished, the pain returned. No pain, no gain is a fallacy.

I tried massage therapy and it sure felt good at the time, particularly when it is carried out by an attractive young female. It could make my back and shoulder feel okay for a few days, but did nothing for the knee.

I tried cortisone shots and they gave me some real relief . . . for about three weeks. There is a limit to how much of that stuff you can take, so I ended up with needing relief after those three weeks.

When I was outside working in my yard one day, a neighbour dropped by and he could see that I was hurting. He said, "You know, I found this great stuff to rub into the painful area and it really works". I asked what it was and went out and got some. In accordance with the instructions, I rubbed it vigorously into my sore knee. Later I saw the neighbour again and he asked how the stuff had worked. I said, "I guess it worked a bit." "What do mean it worked a bit?" "Well" I said "my hands went numb but my knee still hurts!"

Christmas & New Years 2016 in South America and Antarctica Part 2-Antarctica: The Continent and the Concept; the Cruise Visit by 6559 Gerry Mueller

Geographical Antarctica Antarctica is the Earth's 5th-largest continent, unique in not having a permanent human population, in the sense of persons being born and living a significant portion of their lives there. That said, there is a varying population of scientific and support personnel, ranging from about 4,500 during the Antarctic Summer to a little more than 1000 in the Winter, and at least 8 children have been born.

The land mass covers nearly 12 million km², and all but about 0.4% of this is covered in thick glacial ice with an average depth of 2300m, and maximum almost 5000 m. This glacial ice forms large ice shelves, glacial ice floating on the ocean where the slowly flowing ice reaches the water, which then break off at the outer edges forming large tabular (flat topped) ice bergs. While normally of significant size, ie. several city blocks above water, a recent phenomenon, attributed to climate change, has been the "collapse" of these ice



September/septembre 2017

Page 6

Christmas & New Years 2016 in South America and Antarctica Part 2- (Continued)

Geographical Antarctica Antarctica is the Earth's 5th-largest continent, unique in not having a permanent human population, in the sense of persons being born and living a significant portion of their lives there. That said, there is a varying population of scientific and support personnel, ranging from about 4,500 during the Antarctic Summer to a little more than 1000 in the Winter, and at least 8 children have been born.

The land mass covers nearly 12 million km², and all but about 0.4% of this is covered in thick glacial ice with an average depth of 2300m, and maximum almost 5000 m. This glacial ice forms large ice shelves, glacial ice floating on the ocean where the slowly flowing ice reaches the water, which then break off at the outer edges forming large tabular (flat topped) ice bergs. While normally of significant size, ie. several city blocks above water, a recent phenomenon, attributed to climate change, has been the "collapse" of these ice shelves, freeing enormously large bergs. One, which was beginning to break off the Larsen C ice shelf during our cruise has since broken off, and is the size of Prince Edward Island! Notably, the average precipitation is only 150 mm/year, which is equivalent to about 1.5 m of snow, which then slowly compresses to form the ice sheet covering the continent. By this process it is estimated that 90% of the Earth's fresh water is trapped in Antarctic ice; if all were melted, world ocean levels would rise by 80 m! Surrounding the continent is a variable area of sea ice, frozen salt water, covering about 4 million km² at its smallest in Summer, increasing to as much as 19 million km² in Winter.

Political Antarctica There are no nations in Antarctic, no indigenous population, no permanent inhabitants, nor is it the sovereign territory of anyone. There never been war in Antarctica, although shots have been fired over the heads of "trespassers". There is politics! Antarctica is governed by an international agreement, the Antarctic Treaty System. Originally signed in 1959 by 12 nations, now 53 nations have acceded to it. Twenty-nine have "consultative" (voting) status, they are either one of the original signatories or have significant Antarctic research, the remainder are "non-consultative" (non-voting), having voice but not vote at Consultative Meetings, and agree to be bound by the Treaty. Countries may also accede to an "Environmental Protocol" and to Conventions "for the Conservation of Antarctic Seals" and "for the Conservation of Antarctic Marine Living Resources". Canada has non-consultative status, and has agreed to all the Protocol/Conventions.

The Treaty was necessitated by the conflicting territorial claims of 7 nations with Antarctic interests. Norway, Australia, France, New Zealand, Chile, Argentina, and the UK had each claimed some part of the Antarctic as their sovereign territory. Trickiest was the claims of Chile, Argentina, and the UK to the Antarctic Peninsula and nearby islands, and with each treating the other two as "trespassers", shots were fired over heads.

The Antarctic Treaty deals with these and all conflicting claims by ignoring them. No claims are dissolved or disallowed, nor does the Treaty recognize any of them. Basically, nations agree to ignore their own interests, without giving up the right to reassert them at any time, as the Treaty can be dissolved by consensus. But this would be difficult to achieve, and, probably, even more difficult to defend. Instead, the Treaty allows every-



September/septembre 2017

Page 7

Christmas & New Years 2016 in South America and Antarctica Part 2- (Continued)

everyone to get on with running the Antarctic as a very large scientific laboratory, and in more recent years, as a tourist destination. Under the Treaty, every consultative nation (that is with significant operations on the continent) has the right to inspect any other nation's facilities. Military build-up is forbidden (as is disposal of nuclear waste!). Cooperation in science and mutual assistance in need are a given in an environment hostile to humans, and even at the height of the Cold War there was considerable cooperation between the USA and the USSR.

The Environmental Protocol, which came into force in 1998, is of particular importance for the growing tourism to the Antarctic. Basically, it sets out mandatory rules for all human activity. However, since the Antarctic has no government, no police, no justice system, the Protocol requires signatory nations to enact domestic legislation to enforce the environmental rules in Antarctica for their citizens. Under the Protocol, all visitors to Antarctica, roughly defined as going south of 60° South, even if they do not plan to set foot on land, must obtain a permit from the Antarctic authorities of their home nation. Fortunately, if one is visiting on a cruise ship, the tour operators takes care of those applications, but if one is travelling *via* one of the many smaller operators of dive ships and private yachts, you are on your own.

Antarctica Tourism While there are sight-seeing overflights of Antarctica to be had, at very high cost, most tourists visit *via* a ship of some kind, ranging from motor yachts taking 10 to 20 passengers, to cruise ships with as many as 3,200 passengers. Most visitors will travel on small (fewer than 500 passengers) up to mid-sized (less than 1,500 passenger) cruise ships; our ship, *Zaandam*, is about 1,200 passengers. For the hardy, there are Russian icebreaking ships, generally out of Ushuaia, but I am told these are basic in accommodation and comfort, and only for the dedicated "explorer" in search of bragging rights. Current numbers



for annual visitors is in the order of 40,000, over the roughly 4 months (November – March) during which the weather is suitable, and adding up total numbers, over the years that tourism to Antarctica has been possible, something of the order of 1 million of the world's population have visited there, ie. a vanishingly small fraction; that's bragging-rights enough for me.

The term, Antarctica tourism, is something of an exaggeration. Very few, probably none of the tourists (as opposed to scientists and support staff) will visit what might be called continental Antarctica. Almost all Antarctica cruising is restricted to the north-western part of the Antarctic Peninsula, with few ships going further than about 65° South. (The red outline in the map at left shows just how small a fraction of the Antarctic is accessible to tourists by conventional means.) To go that far south in the Antarctic Summer requires that ships be "ice hardened", further south requires ice-breaking ships; those

carrying far fewer passengers, with far less comfort than the cruise ships.



September/septembre 2017

Page 8

Christmas & New Years 2016 in South America and Antarctica Part 2- (Continued)

There are further restrictions on what "tourists" can do. First, only ships with fewer than 500 passengers can put people on shore, and as there are no large docks, that means either using ships' tenders, or Zodiacs or the like. As each group of 10 to 20 passengers must be accompanied by an experienced Antarctic guide, this further limits numbers and the time that can be spent on shore per person. Even a small cruise ship may spend all day at anchor and each passenger only get minutes on shore, while the rest of the day is spent gazing at a very limited view. In comparison, "large" cruise ships, such as *Zaandam* can spend all day, considerably long days of more than 20 hours daylight, cruising the scenic parts of the peninsula, and thus give their passenger far more views of the amazing scenery of this part of our world.

Cruising the Antarctic is Different! June and I have done a lot of cruising since I retired, more than 125 days at sea. Antarctic cruising is different. The passengers are of a more adventurous type, interested in learning about the places they are visiting rather than shopping opportunities. The "Gala" evenings are far less formal, very few dinner jackets and long gowns; blazers and cocktail dresses are about as formal as it gets. Partly that is the result of packing for a cruise that effectively requires clothing for all 4 seasons (Canadian Winter, northern Chilean pleasant Summer, southern Chilean and Argentinian wet Spring, Antarctic Summer which is like a mild Canadian Winter, and tropical northern Argentinian Summer). But it is also partly the result of travelling with a group of adventurous and inquisitive people who are there to learn about a remote part of our world, not for the party!

The itinerary was subject to far more conditions than we were used to; many of the ports-of-call and all the Antarctic itinerary had riders – depending on weather – and for the Antarctic - depending on ice conditions. We were very lucky with weather and ice, so lucky that our Antarctic itinerary included more than had been planned. However, it very quickly became clear that we were not so much on a cruise, as on an expedition, and that where we went and what we saw was very much dependent on the immediate conditions, rather than on a fixed schedule. There was additional personnel to what would normally be a cruise crew; firstly, there was an "ice captain", a senior sailor with Master's qualifications, with special experience in ice conditions and being locked in place by ice movement. And secondly, there was an "expedition team", three retired Antarctic scientists, two of whom were always on the bridge during daylight hours providing commentary on the outside sound system on the passing scene, and occasionally announcing "attractions" such as "whale pod coming down port side" (such announcements causing roughly 1,000 people to move to one side of the ship and causing a slight tilt, according to one engineering officer I spoke to).

But most importantly there is a change in "conditions" as soon as the ship crosses 60° South. The Environmental Protocol comes into effect. Perhaps the most severe impact is on smokers; smoking on outside decks and balconies, indeed anywhere on the outside of the ship, is prohibited – and as the interior of the ship is entirely non-smoking this does cause a certain amount of hardship. There is increased crew presence on the



September/septembre 2017

Page 9

Christmas & New Years 2016 in South America and Antarctica Part 2- (Continued)

outside decks to enforce this and a "nothing is to be thrown overboard rule" with an accompanying "no food or drink on outside decks" rule. Warnings are posted at all access to the deck doors to secure one's head covering and anything else that might get blown overboard by the constant strong winds. And the ship's engines are switched to a clean-burning diesel fuel, to minimize soot entering the atmosphere.

There is also a less-noticeable impact on ship's operation. During night-time, rather than idling inside a channel or bay, the ship moves at least 12 miles into open ocean. One reason for this is to avoid being trapped by ice, which can move very rapidly if there is a wind shift. The other is to take advantage of limited permission under the Environmental Protocol to discharge waste. Treated "grey" water, effectively as clean as potable water, may be discharged, as may ground up and sterilized food waste. The later becomes part of the Antarctic food chain, being eaten mostly by krill, which in turn is the main diet of penguins.

Cruising the Antarctic Peninsula Drake Passage, the body of water between Cape Horn and the Antarctic Peninsula is famous (infamous?) for some of the roughest seas in the world. The *Antarctic Cruising Guide* lists its "Points of Interest" as "huge swells & rough seas, seasick bags, the ceiling above your bed"! Here the easterly-flowing Antarctic Circumpolar Current squeezes between land masses, and although the Passage is 645 km across, 130 million m³/s flow through it, and somewhere near the middle the relatively warm sub-arctic waters of the north meet the colder water of the south, causing a sudden large temperature drop, and consequent unstable weather. Yet for us Drake Passage took on its alter ego, "Drake Lake", so much that we arrived at the Palmer Archipelago well ahead of schedule, midafternoon December 30, rather than next day at 9 a.m. That gave considerably more hours of scenic cruising, and made for a considerable rearrangement of the planned itinerary. (The map shows – roughly – the extend of our Antarctic cruising, at least the part for the "tourists" – it does not include the nightly excursions of the ship to open water, at least 12 miles off-shore. The inset map of the whole of Antarctica with the enlarged area shaded again shows just how small a portion of the continent is covered in these cruises.)

Our entry passage into actual Antarctica was the Schollaert Channel between Anvers and Brabant Islands, the two largest islands of the Palmer Archipelago, leading to the Gerlache Strait, which is cruise ship main street, as inevitably ships travel in or across it several times in all directions navigating between sightseeing opportunities. (A note on naming in Antarctica; most channels and passages, islands and geographic features are named after early Antarctic explorers, and, occasionally ocean parts are named after ships which sank there. But literally thousands of geographic features, mountains and mountain ranges, glaciers and other features remain unnamed,)

(To be continued in a future edition)



Issue/Numéro 104 September/septembre 2017

Page 10

Closing Notes

An absolutely horrible summer in Ottawa appears to be going out like a lamb—not a good incentive to sit around inside putting this together, but thanks to the larger than usual number of submissions I was shamed into putting this out. Thanks to Andrew, George, Gord and Gerry for their interesting inputs. Hope to hear from others soon,

I am now almost totally recovered from two knee replacements over the past year and am eternally grateful to my surgeon and his team for getting me more mobile and comfortable that have been for many years.

I attended Ed Sanford's memorial and was both saddened and heartened by it—saddened by the loss of a comrade, but heartened by the great show of solidarity presented by the large Class of 65 turnout.

Finally, on a technical note, I am wondering if anyone else has suffered the following problem and if you have found a solution. I have Windows 10 and was using Microsoft Edge. For some reason, Edge has disappeared and I can't seem to be able to recover it, so have switched to Google Chrome. The specific problem as it relates to this publication is that I can no longer produce Pdf documents, not convert pdf to Word. Hence you are getting this in Publisher format and I don't know if everyone can open it.

Any simple solutions?