

Tom Swift, son of the famous inventor, Tom Swift, has already had one major invention success and is looking for another one.

The Second World War has been over for only a few months, and Shopton is beginning to return to normal.

With Christmas just around the corner, and icy temperatures enveloping the entire town, the only thing missing is snow. To Tom, a green yard is no holiday yard!

Tom is not alone. His little sister is sad that she can't go sledding. Other children, and adults, are complaining about the lack of white stuff. Without snow, it just doesn't feel like Christmas.

He takes it upon himself to come up with a solution to the town's missing snow. Can he devise a way to save Christmas?

THACKERY FOX & Associates, Publishers Waukegan, Shopton and Yukaipa USA

THE YOUNG TOM SWIFT JR. CHRONICLE TOM SWIFT SAVES CHRISTMAS By T. Edward Fox

©opyright 2010 by the author of this book (T. Edward Fox- pseud.). The book author retains sole copyright to his or her contributions to this book.

This book is a work of fan fiction. It is not claimed to be part of any previously published adventures of the main characters. It has been self-published and is not intended to supplant any authored works attributed to the pseudononomous author or to claim the rights of any legitimate publishing entity.

# THE YOUNG TOM SWIFT JR. CHRONICLES **Tom Swift Saves Christmas**

By T. Edward Fox

Tom Swift, Jr. wanted to do something to support the war effort, so he developed his first major invention. It will be years before he finds out how important that invention was. And, although he has felt sad about what he thinks is a failure, he is undaunted. He loves the whole process of inventing. It's what he feels he was born for.

Now, with the war recently ended and young families reunited all over Shopton, he has been looking forward to Christmas.

There is just one thing in the way. Shopton in gripped in one of the coldest winters in its history. It is also suffering from the driest winter on record. And dry weather means no snow.

To Tom, and many of the people of Shopton, a Christmas without snow is a disappointment.

So, he sets about trying to invent something to bring a good dose of the white stuff to the little town.

This book is dedicated to kids who see an issue or a problem and set out to make it right. Whether this is something like Tom does or just getting out to collect money for people in need, it's children who do those things that give all of us hope for the future.

It is also dedicated to all of the folks who are part of the Tom Swift Yahoo Group. Have a great holiday season... all of you!

# THE YOUNG TOM SWIFT JR. CHRONICLES **Tom Swift Saves Christmas**

#### FOREWORD

Watching young Tom grow up has been a treat. He is turning out to be the sort of person parents dream they will rear. A fine, upstanding man and good citizen! But, this is a story about Tom when he was much younger.

Having spent a good deal of time living in areas that see snow just about as often as the Sahara gets rain, I well know how the lack of having a 'white Christmas' can be the source of sadness and disappointment.

Now, I've also lived in areas that see more snow for more months than people are suppose to endure. Only a few get exactly the right amount. Ah, well.

With World War II in the rear-view mirror of life, the good people of Shopton already had a lot to be thankful for and to celebrate. But, people being people, they all knew that something was missing, something that would make December 25, 1945, the very best Christmas ever.

You can probably tell from the title that our young Tom comes to the rescue, and I hope that doesn't take away from your enjoyment of this short story.

To all who celebrate a special holiday in December, I wish you and your families a happy and healthy season of joy.

Victor Appleton II

#### **NOVEMBER 30, 1945**

#### **Forecasting a Disappointment**

"IT ISN'T fair!" Sandy Swift wailed. She turned to her mother, Mary Swift and favored her with one of the best pouts she could muster.

"All you need to do now, dear, is to cross your arms, nod at me, and then sweep from the room. All very theatrical!" her mother told her with twinkling eyes. She well knew how dramatic her young daughter was becoming and tried at every opportunity to poke fun at such behavior.

Sandy considered what her mother has said and then tried to do just that. She got things mixed up and ended up stomping from the room and up the stairs to her bedroom. She made it to the landing half way up and then stopped to listen to see if anyone was going to come after her.

Hearing nothing but her mother's giggles and her brother's laughter, she stomped extra loudly the rest of the way up, and then down the hallway to her room. She knew better than to slam her door so she just sighed and walked into the room and sat on her bed.

It was all... well... unfair. *Here it was*, she thought, *the very last day of November*.

Even the Thanksgiving leftovers were gone including the giant turkey her father has brought home, the first one since she almost couldn't remember when they had a turkey before. Years ago.

There had been a few years of not having some things, or at least not very often. Something, she believed, to do with a bunch of silly boys and men running around across the ocean trying to shoot at each other. *Stupid boys*, she had thought. Running around playing soldiers miles away when they could just play right here in Shopton. At least, that's what she had thought until two years ago when three of the children she knew at her school had suddenly been taken out of class one day.

It was that night that her mother and father patiently explained to her about war and death and grief. She had cried herself to sleep that night and for several more nights that week.

But, now that the war was over, her thoughts turned to normal things. Things like the weather.

It had been bitterly cold for more than three weeks. So cold that her mother drove her to and from school every day. So cold that she went bundled up in her undershirt and regular blouse and then a sweater and then a goose down-filled coat that was at least three sizes too large but that accommodated all of the other clothing she was forced to wear.

Everyone came to school so thickly covered with coats and slickers and mittens and knitted hats that it took at least ten minutes for them all to strip down to their school clothes, and then fifteen minutes for them to all get back into their outer coverings before they could go home.

And it wouldn't be so bad if it weren't for the most unfair thing of all.

With the bitter cold came absolutely no snow! Nothing. Not a flake.

The skies were blue and the streets were free and clear, as were the sidewalks. The playground behind the school was not the least bit inviting. The children all stayed inside during the recess breaks looking and sighing at the bare, frozen ground.

The only excitement had come two days before Thanksgiving when the school smart aleck and know-it-all, Davey Petri, had taken a dare and put his tongue on the metal cleat of the flag It required three glasses of warm water, the principal plus two teachers, and two tries to unfreeze his tongue from the thing and he still was having trouble pronouncing some words a week later.

Sandy sat deep in thought. After a few minutes she made her decision. What good is it, she said to herself, to have the most famous father in the world, the very best inventor ever, if he can't do something about the lack of snow?

Downstairs, her mother and brother, Tom, were conversing about the same subject.

"I wonder if we are going to get any snow, Mom," young Tom said. "I mean, it is winter after all. Shouldn't we have some snow by now?"

"Well, I am not trained in forecasting the weather, Tommy oh. I'm sorry. I *did* promise to call you Tom, didn't I? As I was saying, I am not an expert, but I would believe that we would hear about it before it happened. Have you turned the radio into that station in New York City that gives the predictions?"

"Yes. Nothing. The old man who reads the news at WRCA keeps saying that we are in for a dry winter and a wet spring. I wish it were the other way around!"

They sat in silent thought for a few minutes before Tom got up and went to the back door. He wiped away some condensation from the inside of the window and peered out at the thermometer nailed to the side of the house.

12° above zero!

When he returned to the living room, his mother was just setting aside the morning newspaper and getting ready to go to the kitchen to start the dinner preparations.

"Can I bring you anything?" she inquired.

"Naw. Is it alright to turn on the radio, Mom?"

She smiled and nodded. "Maybe there will be some sort of good news," she told him heading out of the room. "It won't be too many years my young son before you will look forward to non-snowy winters, especially when you have to drive in them!" she stated quietly, more to herself than anyone.

Tom switched on their Philco chair-side radio and laid down in front of it, watching through the air vents to see the tubes warm up and begin to glow orange. A minute later he sat up and turned the volume knob up. The announcer was finishing his introduction to the tune that would be playing in a moment.

Unseen by Tom, Sandy had crept part way down the stairs and was sitting on a step, watching her older brother. Although only a year separated them, he seemed so much older and wiser to her than she was. She smiled as she looked at his short-cropped blond hair. While she loved her silky blond hair, she sometimes wished that it were permissible for girls to have short hair. At least in the summer.

The brief commercial for a new type of deodorant cream neither Tom nor Sandy had any idea why anyone would want to smear something under their arms!—was over and the sounds of an orchestra, especially the strings section, struck up the number. A moment later, Bing Crosby's voice crooned out the first six words of the song, *White Christmas*, and Sandy gave a little shriek of disgust and ran back up the stairs.

Tom rolled over in time to see her heels disappear at the top step. He knew how she felt. The lack of snow was the big topic in his classes. It seemed that everybody was bothered by the lack of snow.

His Sciences teacher—a nice man who felt entirely intimidated by Tom's presence in his class as he believed the young man knew at least twice what he did about the subject had told another student just that morning that there was little or nothing that anyone could do about the weather. "You just prepare for it and ride it out," he had replied to the question.

Fifteen minutes later, the newsman for the station announced that, "News and a new weather prediction will follow these important messages!"

Three minutes after that, Tom had heard "important" information about two types of cigarettes, a new 1946 Packard Clipper automobile, an advertisement for an aid to something called "that bloated feeling"—which Tom thought sounded lot like good old constipation—and three fifteen-second spots for Falstaff beer.

He was ready to change the channel by the time the news reader came back on the air. Four minutes later he announced —to Tom's groan—that he would be "right back after these kind words from our generous sponsors."

Tom made a face at the Philco and stuck his tongue out at the image his mind conjured up of the newsman's face.

When the live report came back, Tom jumped up and sat in his father's chair so he could lean over the top of the radio and hear everything.

"Well, folks. We have some good news for you, weather-wise. These beautiful, crisp autumn mornings will continue for at least the next month with no sign of rain or snow or sleet or hail. That will make our mail delivery men happy!"

Tom turned the power know to the left and the radio went silent.

"Rats!"

#### **DECEMBER 9, 1945**

#### **First Attempts**

IT HAD taken several conversations with his father, Tom Swift the rightfully world famous inventor, to convince young Tom that controlling the weather was beyond even the capabilities of The Swift Construction Company.

By December 3rd, Tom had admitted that weather manipulation was a thing for the future.

"All that means, Tom, is that is will be people such as yourself who will tame and direct the weather. I may well live to see it, but you and your generation will actually do it," his father had stated, very matter-of-factly at dinner that evening.

Sandy sat across from her brother and gave him one of her sweetest smiles. Tom noticed it and looked at his sister with curiosity. "What?" he asked her.

"Well, Tommy-no-mo, I was just thinking that if you are going to do something to control the weather some day, like Daddy says, then you might as well get started on it right now."

Her conviction was palpable. She had every faith in her brother's ability, even where it concerned the impossible. This had been confirmed on overhearing their parents talking in hushed tones one night about Tom's video cameral transmitter —the one Tom thought had been a failure but had actually been vital in winning the war in Europe. Tom senior had told their mother, "That young son of our has just performed the impossible, Mary. I swear, if someone ever wants to go to the moon, Tom's the one who will do it!"

Tom looked at his younger sister. "Gee, San, I don't think—" He stopped. Just because something is called 'impossible,' that doesn't mean it is. Sending music and voice through the air without the use of wires was considered impossible once. Flying through the air in a metal tube with stiff wings was once 'impossible.'

"Alright, San. Just suppose that there is something that can be done. I read in one of Dad's magazines that a man out here in New York, someone at General Electric, is trying to develop a way to squeeze rain out of clouds that don't want to rain. Isn't that right, Dad?"

"Now that you mention it, I even know the man, slightly. Vince Schaefer. He's using some calculations developed by another man I'd never heard of until I read that same article. Bernard something or other, I think."

It all seemed so obvious to Sandy. She placed her hands on her hips and stared first at her father and then her brother. Finally, she let out a strangled yelp and jumped to her feet. "Well?" she demanded.

"Well, what, Sandra?" her mother asked patting Sandy's chair and motioning with her eyes to 'sit down."

Letting out an exasperated sigh, something she had been working on perfecting with her friend, Phyllis Newton, for months, she sat back down and said, "Why don't you call this man and tell him to come to Shopton and make it rain? Won't it turn into snow on the way down, it's so cold and everything?"

"Well, Sandy," Mr. Swift began.

Sandy knew the tone of his voice. It always signaled that what was about to follow would tell her that she was wrong.

"Oh, Daddy!" she told him. She threw in a small lower lip quiver, hoping that it would aid her case. "Please don't tell me that it's impossible. Please!"

Trying to hide his smile behind taking a drink of water, he looked at her and replied, "It isn't that it is impossible. Given time and resources, I very much doubt that there is anything that is truly impossible. But for now, the approach this man has outlined is certainly a bit impractical. Even to test." he turned to his son. "Do you remember what all he believes will be involved, Son?"

Tom took a deep breath and searched his memory. "I think that he says you need a special airplane, one that can fly fairly slow and at a high enough altitude to go right over the tops of the clouds. Then, you spray out— uh—spray out something that makes the water in the clouds want to drop out."

Mr. Swift nodded. "Right. And," he looked at his daughter, "even if you have the airplane and the chemical he thinks will do the trick, you still have to have clouds."

Sandy looked crestfallen. "There haven't been any clouds up there for weeks and weeks. Guess we'll have a lousy Christmas!" Tears were welling up in her eyes as she slid from her chair and raced from the room.

"Is it really that hopeless, dear?" Mary asked her husband.

"I'm afraid that it is as long as there isn't any moisture up there," he told her.

Tom had followed the entire conversation, but had also been trying to think of some way he might succeed in bringing snow to Shopton. And, in time to give Sandy her perfect, white Christmas.

"Dad," he spoke up. "What about taking up a tank of water and spraying it in the air? Didn't you once say that you thought your *Red Cloud* airship might have been a top-notch air sprayer?"

The *Red Cloud* had been an early invention in Mr. Swift's long list of devices and machines. Built by him, his father, Barton Swift, and a balloonist named John Sharp, it had proven to be a fun and comfortable lifting machine capable of carrying several people and supplies skyward using a special mixture of gases in its rigid, aluminum upper tank, or taking off like an airplane using abbreviated wings capable of great lift.

"Well," Mr. Swift started, then stopped to rub his chin in contemplation. "It did have a lot of lift and could have carried several hundred gallons of water—perhaps as much as four hundred. But, that little amount of water would only mean hmmmm?"

He pulled a slide rule from his shirt pocket and performed several calculations before continuing.

"It looks like for every hundred gallons of water, and this assumes that you could disperse it in fine enough droplets, you might see an inch of snow covering about four hundred square feet. Not too much, unfortunately," he finished, a little saddened that his numbers were not very comforting.

Tom asked what it might take to lift one thousand gallons of water, an amount he had mentally figured might provide a blanket of several inches over an area the size of the little playground in downtown Shopton.

Mr. Swift suggested that Tom go figure that for himself.

"But, don't come back to me and ask me to provide you with some heavy lifting blimp the size of that Hindenburg disaster," he warned with a wink.

Tom did do the calculations and was surprised to discover that it would take a lot less than he thought. "Just so long as I can keep the balloon and the container light enough, I could take that much water up using a balloon just a hundred feet across," he told Sandy the next morning.

Sandy had already given up hope for any snow. She looked at Tom and told him, "Daddy isn't going to build you a giant balloon like that, you know."

"Not unless I could prove that it would work," he told her.

He went to his workshop—a small shed in the Swift back yard. It was only 15° above zero outside and it seemed to be colder than that inside the shed, but Tom had set his mind to building a balloon and water sprayer that could launched to a height of several hundred feet; high enough he had figured, to let the water freeze in the current temperature yet low enough so that it would drop mostly straight down and not blow away.

Looking through his stash of discarded apparatus and items from around the Swift home as well as those scavenged from the local city dump, Tom practically overlooked a dented metal canister on his initial search. Finally pulling it out, he saw that it was exactly what he was looking for—a two-gallon pump sprayer with a fine mist nozzle.

He filled it with water and tested it by pumping it up until his arms both felt like limp noodles. It worked! It not only held water, it held pressure, something that he tested by letting it sit overnight and then testing it in the morning just before school. Mrs. Swift hadn't been too pleased to see it sitting inside the back door, but Tom explained that he couldn't leave it in the shed—the water would freeze.

That afternoon Tom cut out the pieces of fabric that his mother agreed to stitch together to form the balloon. As soon as it was finished, he coated the inside and outside with a rubber paint his father purchased at the hardware store.

Over the weekend Tom attached the tank to the balloon and rigged up a small valve that could be operated by pulling on a length of clothesline he had appropriated from his mother's supply.

Ned Newton, Tom's father's best friend since childhood and the second-n-command at the Swift Construction Company had offered to let Tom use some of the helium kept on premises for various purposes, and to let him utilize the back lot for the launch and use of his new snow apparatus.

With Monday being a half-day of school before the holiday

vacation, Tom set a launch time of 4:00 p.m. The temperature hovered in the low teens all day long. Once he had filled the new balloon with helium and tested the tank and valve, he gave it a thorough pump up and prepared the thing for launch.

Sandy and Mrs. Swift sat in the Swift sedan, waiting for Tom to send his latest invention skyward. Sandy had implicit faith in her brother's abilities, but still kept all of her fingers crossed.

After a nod toward the occupants in the car, Tom unhooked the balloon from the front bumper. It immediately rose taking the weight of the tank in stride. A minute later it reached the maximum height Tom was allowing—about sixty feet.

Tom took a deep breath, closed his eyes and said a silent prayer. *Let this work*, he intoned over and over. *Let this work!* 

He gave the clothesline a little tug and looked up. At first, only large drops of water seemed to be escaping. He tugged the line again. Evidently, the valve had not been fully open because with the second tug, the sprayer began doing its job.

A fine mist could be seen shooting out. Within a few seconds Tom could feel the tiny ice crystals as they hit his face and hands. He moved to one side as they began to sting.

Looking up, Tom's heart sank.

His sprayer wasn't making snow after all. It was making micro-sized pellets of ice.

### **DECEMBER 18, 1945**

#### **Back to The Drawing Board**

TOM'S FATHER looked askance at his boy. "So, are you giving up?" he inquired that evening at the dinner table. Tom had filled him in on the entire project, including the failure of his sprayer to make anything resembling snow.

"No, sir. I don't think so."

"What will you do now?"

Tom thought a moment before replying. "Guess I need to start over. I'm missing something, I just don't know what."

He excused himself before dessert and went up to his room. Sandy offered to take his hot apple cobbler up to him, so Mary Swift prepared a dish and gave it to her.

Once their daughter left the room, Mary turned to her husband. "Isn't there something you can do? I just want to cry when I think of the disappointment Tommy feels over that transmitter invention. For gosh sake, it supposedly saved hundreds or even thousands of lives, and he thinks it's worthless! He isn't old enough to stand two failures."

Her husband reached over the table and took his wife's hands in his. "Mary. We've been over this before. Tom can't be told about how important his camera transmitter was. It is still classified Top Secret. Even you shouldn't know about it. The only way he could be told is if—" He stopped himself.

"If?" There was a hint of desperation in her voice.

"Now, Mary Nestor Swift, get that look out of your eyes. I was going to say if he accidentally saw the final equipment some time, but that's not going to happen. Not yet. Three years and I will tell him everything. As for his snow machine, the best I can do is try to get him in touch with the man at GE and see if he can share anything with Tom. Agreed?"

She looked deep into his eyes then lowered hers and nodded in resignation. It just hurt her so much to see Tom's sadness whenever something didn't work the way he thought it must.

Sandy, sitting on her favorite step just below the upper landing had heard much of her parent's conversation. Even at her young age she knew that what they had said was a secret and not even she should tell Tom. It weighed heavily on her shoulders, but she instinctively knew that it was for his own good.

She stood up and tiptoed down the hall and knocked lightly on his bedroom door.

"Yeah. come in," Tom called out sounding distracted.

Sandy opened the door and poked her head inside. "I brought your cobbler. You want it?"

Tom was sitting at his desk a pile of papers on one side and a stack of books on the other. "Huh? Oh, yeah. Sure. Put it over on the bed. I'll eat it later. Uh— thanks, San."

She put the bowl on the bed and walked over to stand by his side. Standing silently, she scanned the single sheet of paper directly in front of him. It had a sketch of something with tubes and bends and twists and arrows and scribbled notes that she couldn't make out.

Sandy leaned over and rested her elbow on Tom's right shoulder. Leaning into him, she moved her mouth down next to his ear. "Want to know something, Tommy-no-mo?"

He put his pencil down and turned toward her. "Sure, Sandy. What?"

"I know you can do it!" she stated as if it were an inalienable fact. "You just have to believe that you can." Tom moved his right arm around her waist and pulled her closer. Giving Sandy a squeeze, he whispered, "Thanks. That means a lot to me I just wish that I had better results from the test today, that's all."

Tom took a walk around downtown Shopton the following day. He still had to find something for Sandy for Christmas now that it looked like his snow machine wasn't going to do the trick. Three different people stopped him and asked about his snow maker.

Flabbergasted, he asked one, "But, how do you know about that?"

"Well, my son Alexander is in the same class as your sister, Sandra, and he said that she told everyone about it," one mother replied. "We're all rooting for you!"

*Can't keep a secret to save her soul*, he thought, at first angrily and then pondering if he had ever told her that it was suppose to be a secret.

He recognized a man and young boy approaching him. It was Davey Petri and his father. The older man paled as he saw who was walking toward them. He still remembered having to explain to Tom and his father, and a local policeman, about his son having stolen some of Tom's equipment. His embarrassment was plainly written on his face.

Not wanting to bring the subject up, he tried to turn his son into the first store, but Tom called out, "How's the tongue, Davey?"

The boy reddened and said something that sounded like, "Nerts!" but Tom didn't quite make it out. He secretly smiled at the obvious discomfort, physical as well as emotional, that Davey felt.

Buoyed by having made Davey's day miserable, Tom's steps became lighter and easier. He decided to visit the Shopton Carnegie Library to see if he might find an answer to his snow The reference librarian tried to assist him, but she couldn't quite grasp the concept of what he was trying to do, so she was of little help. "Surely, God makes it snow," she had replied to his request for books on snow. "I don't have any books on how he does that."

He found several volumes on hydrology, the study of water, and set about reading as much as he could before heading home for dinner. At the table, he talked about his finding with his father.

"So, I'm pretty certain that you can't make snow from so close to the ground," he had concluded. "It needs a long fall to flatten out the water drop and to crystallize into a flake. Now I have to find a way to send my balloon up several thousand feet and then have the valve open by itself."

"You may have a problem there, Son," Tom senior told him. "It is illegal to release anything that might become a hazard to flying and navigation. I'm afraid that includes your balloon and metal tank. Nothing over one hundred feet and always tethered. I know you're disappointed, but I can't let you break the law."

Tom thought about it and had to agree.

Sandy thought about it and wasn't happy at all. With only four days until Christmas, she was trying to come to grips with the prospect of no snow, and it wasn't sitting well.

Mr. Swift handed Tom a piece of paper. "You might want to give that number a call, Son. It is Doctor Bernard Vonnegut, the man who first came up with the idea and the chemicals that might allow people to force clouds to rain. I think that he is expecting to hear from you this very evening."

Tom practically leapt from his chair and raced into his father's study to make the long distance call.

"Well, hello there young Thomas Swift," came the booming voice on the other end of the line. "Your father told me that you might wish to bend my ear tonight. I have plenty of time although I imagine that your folks would like me to keep the phone call as brief as possible. What might I help a young

Tom Swift Saves Christmas

Tom could scarcely think where to start. In seconds he blurted out his basic concept. When he paused to take a breath, Mr. Vonnegut interrupted him.

scientist, like yourself, with?"

"So that I have this all straight, you are having the same icy cold weather we're having here in Albany with no precipitation in sight, and you would like to make it snow? Hmmmm? Well, let me tell you a little about what I am working on. And, I must caution you that I am a year or more away from making it work, but here goes."

Doctor Vonnegut told Tom about his notion that if he could excite water droplets in clouds enough and cause them to become slightly electrified, they should vibrate to the point where they would begin to combine together and become too heavy for the air to support them. Thus creating rain.

"I want to use silver iodide because it does practically everything I need. The issue is getting enough of it up there and spread out thinly enough that it doesn't just fall to the ground. But, that really doesn't help you, does it?"

Tom had to admit that it did not sound like a path to his goal.

He was about to thank the man when the Doctor said, "Of course, I had to start somewhere and that was with the idea that you had to have freezing conditions and the formation of ice crystals, even snow, before you could get rain. That's correct to a point, but it led me to something I think you might be able to use."

"What is that, sir?" the now-excited young inventor asked.

"The main thing is that you can't get from an ice crystal to a snowflake without having a lot of air inside it. That, and a little freezing then melting then freezing again going on. I hope that helps you."

Moments later the call was over and Tom went to his room with a lot to think about.

#### **DECEMBER 24, 1945**

#### 'Twas The Night Before Christmas...

HE LOOKED at his workbench and sighed. The previous two days had been a whirlwind of activity and scavenger hunts. Now, he sat back looking at the strange cobbling of pipes and valves and hoses and his pressure sprayer tank and other bits and pieces.

The weather had conspired against him on this day before Christmas with temperatures racing into the mid 30's, far too warm for any testing.

The information Doctor Vonnegut had given him was indeed the key to everything. At least, on a much smaller scale; smaller than Tom had hoped for. With only hours to go, he was willing to take whatever he could get.

He checked over the bulky rig in front of him. Everything seemed to be properly tightened and connected, but he poured over his sketches and the plan he had made. He reviewed the logic of each and every piece in on the bench. After twenty minutes, he was satisfied. It all looked right.

And, if his theory was correct, and the temperature dropped to at least 26°, Tom was certain that he had a chance to succeed, he just wasn't certain how much of a chance.

Even at an above freezing temperature, Tom was quickly getting chilled, so he covered his rig with a heavy tarp and headed inside for dinner.

Mrs. Swift had decided to have their big holiday dinner on Christmas night rather than Christmas Eve. If Tom's device didn't work, she was sure that he would need cheering up the following evening. For this dinner she prepared two of his favorites: pot roast with roasted vegetables. Conversation was slightly tense until Sandy sensed that something needed to be said to get her brother's mind off of his worrying.

"Phyllis and I were playing upstairs today and she told me that she thinks she will marry a Navy Captain some day. She wants him to be called Larry Wilson."

Tom froze with his fork halfway to his mouth as Sandy said this. Finally, he set the fork down and turned to Sandy. "Oh. And I suppose that you have already picked out the name of the person you are going to marry, huh?"

Sandy replied smugly, "Yes I have. He is going to be a great surgeon and he'll be named Brian Stewart. Either that or Arthur Peacock." She looked at her brother almost daring him to say something.

Tom rose to take the bait. "Firstly, Phyllis Newton is all wet. Nobody is ever going to marry her." Sandy snorted. "Secondly, I'll bet if you could look in some giant book of people and their jobs, you'd spend from now until you are fifty trying to find a surgeon who is also called Brian Stewpot or Peter Peacock or whatever!"

Sandy turned bright red, usually a signal that she was about to explode in anger. Instead, she took a deep breath and glanced at her mother. She looked back at Tom and said, "Well, she might want to marry you, brother dear!"

Tom, who had picked his fork back up and placed the bite in his mouth sputtered and almost sent the meat flying across the table.

"Phyllis— you think I would— I mean Phyllis, after all— She's just— ah... phooey!"

"Now Tom. Phyllis Newton is a nice girl and her father is practically family. She has lovely dark hair and is always dressed impeccably—" "Well, yeah, but she's always dressed up even when she shouldn't be," he complained. "I mean, she wore a dress and petticoats to a swimming party at Lake Carlopa last summer. *A dress*!"

Sandy looked over at he father. He smiled at her, realizing that she was using diversionary tactics to get Tom's mind off of his project. Winking at her, he said to Tom, "Wait until she gets a little older and you get a little older and I have to have that talk with you. Then—"

"What talk, Daddy?" Sandy asked.

Mary Swift looked at her husband and shook her head. "Don't you even try to look at me Tom Swift. You started this. You will have to finish it," she stated as she rose to clear some of the dinner dishes.

Mr. Swift, now red from embarrassment, soon exhausted all combinations of "umm" and "err" and "well, it's..." before Mary returned to the table. "I'll tell you later," he promised and tried to change the subject. "I saw Mrs. Trunbridge yesterday at the department store. She is looking forward to having you in her class next year, Tom. She is a wonderful woman. It's just too bad she lost her husband in the war."

They all sat in silent contemplation for a moment.

"Well, this is fine Christmas Eve conversation," Mary told them. "Sandy, please help clear the rest of the dishes and I'll serve up a nice carrot cake I made this morning."

Once dinner and dessert had been finished and cleaned up, Tom excused himself and went out to the shed. Carefully rolling back the tarp, he admired his work. It looked complicated enough to satisfy any good Rube Goldberg-style inventor.

A hose would go from the faucet at the side of the house and into the former sprayer tank where it would be agitated by a small whisk that was attached to an electrical motor above the tank. From there the water would be pushed out by the pressure of more incoming water and through a series of pipes Tom had specially crimped just so. These were soldered inside of larger pipes that he would pressurize using the hand pump from the sprayer. This would, he theorized, speed up the water as well as draw air into it.

Another tank, this one an old fire extinguisher, would receive the aerated water and would then be further pressurized by an electrical pump Tom had found in an old washing machine.

Through pipe after pipe and finally out through a set of nozzles Tom had made by carefully punching a series of tiny holes in a special pattern into the bottoms of several food cans sealed to the ends of the final pipes.

Below these makeshift nozzles was the item that Tom felt was the absolute secret to success. A large box fan that had been part of the original equipment provided by his father when the shed had been delivered.

All that was left to do was cart everything outside once the temperature got low enough, connect the water and plug the different pumps into the heavy-duty extension cord he already had hooked up inside the house.

A check of both the clock in the kitchen as well as he thermometer outside the back door showed Tom that the time was approaching. He figured that a half hour more and the temperature would be below 30°, the perfect time he planned to begin.

He went inside and arrived in the living room just in time to be handed a piping hot mug of cocoa.

Mrs. Swift's favorite holiday radio show, *A Miracle on 34th Street*, was playing on the radio and Tom got so caught up in the story that he didn't look at the clock until it was over, almost forty minutes later.

Jumping up he scurried outside. Mr. Swift joined him in time

to help carry the rig outside and set it up on two sawhorses Tom had placed earlier in the day.

"Thanks, Dad," he said giving his father a hug.

Tom dragged the garden hose over to the faucet and screwed it into place. He made certain that the other end was attached to his device and then turned on the tap. Although partially frozen, the water still came through with enough force to clear the faucet and soon it was pouring into the snow maker.

Tom plugged the pumps and the fan into the power cord and turned the main control valve. This would control the overall flow of water through the machine and out of the nozzles.

He stood back to watch. A fine mist came out of the nozzles and was blown into the air, but there was no snow. A minute later he realized that he had forgotten to pump up the manual part of the machine to give the water its initial aeration.

Three minutes went by. Five minutes. Then, ten. He was certainly getting ice crystals to form, but still no snow.

He checked over everything yet again. It all looked to be perfect. Tom just couldn't imagine what was going wrong. Sad, disappointed and feeling extremely cold, he trudged back into the house.

"Anything, Tom?" his mother asked.

"No," he muttered. "I'll leave it on for awhile and then go back out to check it. I'll be upstairs looking at my diagrams. Again!"

He trudged up the stair and to his room.

Sitting at his table he tried to look at the papers in front of him, but his eyes stung with the tears he had barely kept back in the living room.

He hated failing as much as he hated disappointing Sandy.

Tom Swift, young inventor, brother of Sandy Swift who so longed for snow at Christmas, cried.

And, soon, he fell asleep.

\* \* \* \* \*

"Oh, Tom!" Sandy squealed in his ear. "It's just magnificent!"

Tom looked blearily around him. He realized that he had fallen asleep at his desk, and the sun streaming through his window told him that it was now Christmas morning.

Getting up and stretching his sore muscles, he promised himself that he would never fall asleep at his worktable ever again.

"What's magnificent, San?" he asked. His mind was having trouble focusing.

Tom let himself be led downstairs by his younger sister. She marched him into the kitchen and pointed out the window into the back yard.

A yard that was covered by a layer of fluffy, white snow at least two feet thick in some places.

"That!" Sandy exclaimed pointing again. "You're the most wonderful brother in the world. I love you!" She wrapped her arms around him and hugged him tightly.

Tom was thunderstruck. His machine was still pumping out a coating of snow. So far it had covered an area about fifty feet wide by thirty feet across and it was growing.

They were joined by their parents, both in pajamas and holding cups of coffee.

"Oh, Tom," his mother said. "Just wonderful. You did it. I'm so proud of you."

Tom accepted a long hug from her and tried to figure out

what had happened.

Mr. Swift shook his hand and also told Tom how proud he was. "I thought you'd given up and gone to bed," he told the youth. "Guess you figured out what was wrong and fixed it."

Tom admitted to them that he had fallen asleep and hadn't done anything. He told them he wasn't sure why it was working now.

"Perhaps it just needed to be a bit colder," his father suggested.

Tom shrugged. He'd figure it out... later.

They couldn't shed any light on it but they all got dressed and went outside to enjoy his success. The snow was very powdery and dry and almost couldn't be formed into a snowball, but that didn't stop Sandy from trying to make one and throwing it at Tom.

He ducked and the ball disintegrated over his head showering him with fine snow that melted as soon as it hit his warm neck.

Sandy came over to Tom and motioned that he should bend down closer. Fearing another snow attack, he shook her head until she showed him that her hands were empty.

"I just wanted to tell you that I love you, Tommy," she told him in a loud whisper and gave him a kiss on the cheek. "This is the best present you could have ever gotten me. You've saved Christmas!"

Tom looked at her and then his parents, and he could see in their eyes that he had, indeed, done just that for his sister.

## **EPILOG**

MOMENTS LATER, Tom looked toward the street that ran next to the Swift home. Standing there, looking apprehensive yet hopeful, was a small boy with a very large sled.

Tom looked at his father, who nodded, so he called out, "Come on in. Have some fun!"

With a squeal of joy, the little boy abandoned his sled and ran forward, plunging head first into the snow. Within minutes he and Sandy were engaged in a game of snowball tag.

For the rest of the day, dozens of children and parents from all over the neighborhood, and even parts of Shopton that were a mile of more away, came by Tom's house to play in his snow.

Dinner that evening was a joyous affair with Tom and Sandy talking nonstop about how wonderful it was to have a real Christmas.

During a lull in the conversation, Sandy sat looking at her brother with admiration. She had known all along that he would come through.

Tom, she thought to herself, can do anything!