Straw Bale House Designed by CASBA
Members Arkin Tilt Architects
Wins Fine Homebuilding Magazine’s “Best New Home” of 2012

Every year, Fine Homebuilding Magazine selects a winning project in each of six categories: Best New Home, Best Remodel, Best Small Home, Best Energy-Smart Home, Best Retirement Home, and Editors’ Choice.

This year, a home designed by David Arkin and Anni Tilt, long-time CASBA members and principals of Arkin Tilt Architects, won the coveted Best New Home award. According to Fine Homebuilding, “When it comes to designing and building new homes, there is no such thing as a blank canvas. Each project comes with a set of challenges that include the topography and orientation of the building site, and the needs, wants, and budget of the eventual homeowners. These challenges... are the criteria for our Best New Home award. The winning home will successfully meet its design challenges with a superior level of detail and craftsmanship appropriate for the given architectural style.”

The winning project, referred to as the Santa Cruz Straw Bale, house is a beautiful example of contemporary design and this high-profile award is more evidence that straw bale building is now part of the mainstream.

~ editor

The Santa Cruz Straw Bale House

Avid surfers and professors of Biology and Environmental Studies, our clients wanted to push the ecological envelope while providing a fun, comfortable house for their family of six, along with a second unit for rental or aging parents. The result is a 2,500 sf two-storey house that includes 4 bedrooms and an office, as well as a small (330 sf )1 bedroom accessory dwelling unit with its own entrance.

Situated in a dense residential neighborhood in Santa Cruz, CA, the site borders a linear park that follows a
creek two blocks to the ocean. The exuberant south façade and generous terraces play off of the lively public park space while taking advantage of the western shading of the creek-side sycamores. The street side presence is more subdued with smaller glimpses of the lively spaces within through a thick, insulating straw bale wall.

Combining cutting-edge mechanical technology with natural building techniques, passive solar strategies, and locally sourced elements, this house is designed for net-zero energy and minimal carbon footprint. Good daylighting, fluorescent and LED lighting, and Energy Star rated appliances keep internal energy loads low. When needed, an ultra-efficient Altherma electric air-to-water heat pump produces hot water for domestic use and space heating via radiant tubing in the concrete slab on the main level, and a topping slab at the upstairs bath. This usage is offset by a 5.2kW photovoltaic array mounted on the roofs of the office and the stairwell volume. Natural gas is used only for cooking.

An efficient plan, solar section and a well-insulated envelope mean that little supplementary heat is needed. Straw-bale walls wrap the north and west, while the wood framed south wall features extensive glazing, opening up to the sun, bringing daylight deep into the living spaces. Deep overhangs and trellises shade the spaces in the summer time, while still filling the rooms with daylight. With no mechanical cooling, natural ventilation occurs by simply opening windows, particularly the high windows in the 2-storey dining space, which can be left open for night flushing if necessary.

A compact house, each space serves several functions, and shifts and changes with the seasons as light and shadow play through them. To wit, the exposed framing in the stairwell becomes bookcase display, and a built-in bench off the upper hall marks the entry below. The dramatic height of the dining room is accentuated with the natural branching of a madrone tree column, found by the owners on a friend’s nearby property. The open dining room is balanced by an intimate living space with a sitting bay rotated towards the park. Recycled and salvaged doors, interior windows, flooring and driftwood pickets, as well as a driftwood column at the entry both reduce the impact of the building, and provide character and sense of place.

Open and intimate, flexible and efficient, budget-conscious, and playful in overall form and detail, this house speaks to the specificity of its place, reflecting the consciousness and vibe of its urban Santa Cruz site.

~ Arkin Tilt Architects
www.arkintilt.com

www.finehomebuilding.com/houseawards

watch of video about this project at www.youtube.com/watch?v=JimNRK77G8o&feature=relmfu
IBC Straw Bale  
Code Proposal Status:  
Bad News / Good News (again!)

Proposals for a Chapter and Appendix on Strawbale Construction in the 2015 International Building Code (IBC) were heard at the International Code Council (ICC) hearings in Dallas. The proposals were heard on April 30 by the Fire-Safety Committee and on May 4 by the Structural Committee. David Eisenberg, a long-time sustainable code advocate and co-author of the first strawbale code in Arizona, testified in front of the Fire-Safety Committee, along with Texas strawbale advocates Bill Christensen and architect Gayle Borst. CASBA members Martin Hammer, Kevin Donahue and Mark Aschheim joined David to testify at the Structural Committee hearings.

The bad news is the Chapter version was disapproved by both committees. The Appendix version fared better in the voting, but was disapproved 9-4 by the Fire-Safety Committee and 9-3 by the Structural Committee. There was testimony in support of and in opposition to the proposal and spirited discussion among committee members with numerous questions asked of the proponent team, but the outcome was not favorable.

The first good news is that the disapproval is not final. There is opportunity to modify the proposal as a Public Comment before the final vote at the Final Action Hearing in Portland in October. The other good news is that there was much support expressed at the Dallas hearings, even from committee members who voted against the proposal and from those who testified on the floor in opposition. To quote Edwin Huston, a structural engineer who testified in opposition, but said afterwards, “There was a lot of support in that room.” Edwin and others sat down with the proposal team after the hearings and gave suggestions on how to modify the proposal and how to garner further support so the proposal might be approved in the future.

So the proposal team is at work gathering additional input, adjusting the proposal, and doing a bit of public relations with two magazine articles. Here is a summary of what is being done before the August 1 deadline for Public Comments, when the modified proposal will be submitted:

* Articles on Strawbale Construction will appear in the September and October issues of Structure Magazine. Structure Magazine is distributed to all members of the National Council of Structural Engineers Associations.

An article on Strawbale Construction will appear in the August issue of ICC’s Building Safety Journal. BSJ is distributed to all building officials and other ICC members.

The current revised version of the proposed code has been distributed to key building official groups and individuals for review and input (building officials in 6 states will comment).

Additional input is being solicited from the code committee of the Structural Engineers Association of California (SEAOC).

Any CASBA member who would like to review the proposed code and make their own comments can contact Martin Hammer (see below).

In other strawbale code news, the County of Marin is considering a proposed Ordinance with a section entitled “Voluntary alternative regulations for the construction, expansion and maintenance of Strawbale Residential Structures”. Spearheaded by Marin County Chief Building Official Bill Kelley, the ordinance uses the proposed IBC code as its basis, and would apply to residential buildings in unincorporated Marin County. The ordinance is expected to pass and would be a significant step forward for strawbale codes.

A note of thanks to the many CASBA members who made contributions to support this code effort at the CASBA conference in early May. A plea was made to attendees, and a remarkable wave of support ensued, with over $700 collected. This was vital to help cover the travel and lodging expenses of the CASBA members mentioned who traveled to Dallas to testify.

Thank you to the following donors: David Arkin and Anni Tilt, Kate Breckenridge, Storm and Kathy Gregor, Tim Owen-Kennedy, Bruce King, Mark Phillips, Jim Reiland and Joy Rogalla, Michael Rottapel, Bob Theis, and other cash contributors. Thank you!! Other recent support has come from David Eisenberg (Development Center for Appropriate Technology, Arizona) and international straw bale practitioners Habib Gonzales (British Columbia) and John Glassford (Australia). Thank you also to CASBA directors Maurice and Joy Bennett for their unwavering support of this effort.

~ Martin Hammer

Martin Hammer is an architect in Berkeley, CA, a CASBA member and strawbale building code advocate. Direct any inquiries to mfhammer@pacbell.net or 510-525-0525
Welcome to summer. Seems like the weather here in Angels Camp went from Spring to Summer in one swoop but so far we have dodged triple digits and the long range looks like a cooler than normal summer (let’s hope).

We had a great conference at Walker Creek. It was a somewhat less structured conference, but one where there was a lot of discussion about CASBA and what it wants to be. There were several basic conversations (The Detail Book revision of course, Marty Hammer and the IBC Code upgrades, the web site) and some basic stuff that need input from the greater whole, not just from the Advisory Board.

The Detail Book – We have a group of dedicated architects and others working diligently to have a published book by the International in September. It is a tremendous crash effort and a BIG thanks goes to Jim Reiland, Joy Rogala and the Berkeley Bunch for sticking with this task.

We would like to welcome Kerstin Sjoquist to the web team. She is a real pro with web sites she has already made significant changes and upgrades, for which we are eternally grateful.

Another new member, Patrick Webb, also volunteered to upgrade our social media profiles, such as LinkedIn.

CASBA gained several new members for the conference and our membership remains strong and active. We hope to involve the membership in more projects and activities: it is with the members help that CASBA will remain in the forefront of straw construction.

Looks like a good contingent is going to the International in Colorado in September. It is not too late to register if you would like to go. Estes Park is a super place for an event such as this one.

Our workshops did not work out again this year. We presume the major reason is the economy but we did revise the workshop to a one-day (instead of a 2-day) event and significantly cut the price, but still no takers.

We will evaluate the format, timing, etc to see if we can come up with a “salable” formula. If a member develops a project that could be a good one for a workshop perhaps CASBA can use it for one of our annual workshops.

We hope that each of you have a great summer. CASBA has the energy and vision and, with your help, we can make the world a better place.

~ Maurice Bennett

---

Jim Reiland & Joy Rogalla Receive the Esteemed Traveling Straw Dog Award

At the recent Walker Creek conference, Darcey Donovan passed along the Traveling Straw Dog Award to distinguished CASBA members and straw bale advocates Jim Reiland and Joy Rogalla.

After attending a Canelo Project workshop and helping at a straw bale greenhouse project in Lincoln, Jim and Joy ventured into the ranks of CASBA at the 2003 Nevada City conference. At the time they were searching for the perfect piece of land with the dream of designing and building their own straw bale house. They have since found their sanctuary in Jacksonville, Oregon, and have built a thoughtfully planned, beautiful and
nurturing straw bale home. Jim and Joy are great examples of owner-builders doing it right: getting involved with CASBA to learn more about building with straw, gaining skills and experience, building, then staying involved and giving back.

Jim has been a CASBA Advisory Board member since 2006, helping to provide direction and leadership to the organization. He was the original workshop coordinator and, with Joy’s assistance, organized several successful workshops and established workshop guidelines. They have been Detail Book Update Committee members since 2008, responsible for editing and publication. Over the years they have attended numerous CASBA members’ straw bale work parties, rain or shine, and work darn hard.

Jim and Joy have been—and continue to be—a wonderful ambassadors for the straw bale construction movement. They are thoughtful, considerate, respectful, professional, all-around nice people and we’re proud to have them as members of CASBA and as our friends.

Congratulations Jim and Joy!

~ Darcey Donovan
Travelling Straw Dog 2011

This last one is where we really need your HELP. Please submit pictures of your straw bale project. Make sure to include a good picture of the completed structure. Let us know the location (city and county), any additional info you do not mind sharing with the world and whether you would like your name posted. We will not show actual addresses on the website. Check out the new, easy-to-use submission form at www.strawbuilding.org/sbweb/content/submit-your-photos

Unfortunately, it seems the economy is still affecting people’s budgets and the project planned for the summer workshops and workparties for 2012 has been cancelled due to low registration. If you have workparties planned, send us the info and we will post it on the website.

This is your website so please let us know your ideas or what else you would like to see.

~ The Web Team
Hundreds of homes were lost in the county, but our small slump stone, tile-roofed home, with a lot of good fortune, proved resilient. We lost only a few trees and a beehive. But luck went our way – we had an old wood tractor shed (held up by a few boards and the wind) that was reduced to six inches of ashes, nails, and a melted roto-tiller engine.

The loss of our shed became a welcome sign. I, Rob, am a retired shop teacher and had taken over our garage for a wood and metalworking shop (men do that – don’t we?). Kim, an elementary school teacher, had just retired, and said, “Now, I want MY place. She, an artist and musician, as I am too, wanted a studio. Our lost shed left the perfect size footprint, and a Disaster-Area permit to rebuild a same-size building was a green flag.

We had always been interested in straw-bale; we had seen and were charmed by them. We said, “Let’s do a straw-bale.” Kim was quiet, then said, “I want to call it ‘Casa Colibrí’” Spanish for hummingbird, of which we have so many around and care for so much. We were straw-bale-studio bound!

For months our dream was whipped by the flickering light of web-pages of beautiful straw-bale artworks, each home nestled comfortably, seemingly having grown up from the soil itself into a country setting just as ours. Our stack of home-building books and magazines became topped with everything straw-bale.

In the 2008, San Diego’s California Center for Sustainable Energy offered a straw-bale workshop presentation – we attended. Our dream took roots. The workshop was partly presented by Bruce King, Martin Hammer, and Bob Bolles, then San Diego’s Mr. Straw-bale, whom we contacted as soon as the meeting was over. We made an appointment for him to see our place. A week later he was there.

Bob greeted us on our front porch – first things first – with a hug. And through Bob Bolles we began meeting straw people. A wonderful straw designer, Audrey Ruland, who talked bales, blue lines and permits; and our soon-to-be straw builder Paul Turner whom I recognized from the presentation.

Paul shared the straw dream with us. He and his brother, Jeff, had built many homes under the tutelage of their father, a respected homebuilder in San Diego. In 2006, Paul, working with Bob Bolles, built a straw-bale home a few miles away from ours, and had fallen in love with the whole process. Building straw-bale became what he wanted to do.

Early in 2011, after a year of impatient planning, with Kim’s adroit handling of the budget, my working with measurements and illustrations and walls and windows, our studio was underway.

Enter, Casa Bandini. Paul’s daughter is an historical archeologist working for the State Parks who run Old Town, a preserved section of downtown San Diego. From the late 1800s San Diego had the Cosmopolitan Hotel sitting on a grid of dusty wagon-rutted roads, that has survived the years, and is now known as the Casa Bandini after its early town mover and socialite owner, Peruvian, Juan Bandini who tall-shipped into San Diego in 1819.

The Casa is a solid old adobe building that had been repaired and restored many times during its life as a store, pickle factory, motel annex, and today is one of San Diego’s finest Mexican restaurants. Kim and I had eaten there many times unaware of the magic that surrounded us.
A recent restoration of the Casa left discarded, 60-year-old old timbers and balcony rails piled to the side. They were big timbers – 8x8 posts, rails of sandwiched 2x6, and piles of 1x3 railing balusters with hand hewn edges lay there for months turned gray from exposure – just scrap, one would think.

But Paul, visiting his daughter at the Bandini site, saw a sparkle in the old pile’s sun-etched patina. He brought the news to us asking if we would want them for Colibrí’s long front porch posts and beams… “Yes!” His daughter inquired of those in charge, thumbs up, Paul could buy them and they would return to duty. Paul’s excitement became ours and soon he and I had muscled two pickup loads into a pile at our home.

One beam was 10x10 inches, at sixteen feet long with corbelled ends, visible in an old black and white photo over the main entrance to the hotel… and we had it… history. In one small piece of wood, Kim found a single, large, rusty square nail, surely a passed-along leftover from rebuilds past – another touch of history.

Now, I like old wood and history and I value recycling - but this was OLD wood. When Paul first saw it, he saw something I didn’t. I was worried. But, a month later, when Paul put a belt sander to the first decrepit beam and finessed a chocolate, caramel color out of it, and left enough of a beautiful patina, I was awestruck, and Paul was THE MAN.

Those big beams stand and span and handshake into a heavy matrix that is Colibrí’s wide front porch. Inside, they reach across to be ceiling below and a loft above. They are majestic! Indeed, they became the center theme of Casa Colibrí – they shout Southwest, Mexico, Craftsman, Rancho, Hacienda, Adobe, and old-home strength and beauty. And from them the beauty and form of our little straw bale radiates.

We were excited and nervous when the backhoe groaned and its hungry jaw scooped the first load of rich loam. We watched day by week by month as Colibrí became concrete, wood, straw, metal roof; and skillfully-mixed mud of clay, sand, and straw; hand-mushed into wire-netted bales, mostly by our clay plaster experts from Simple Construct and, at other times of community celebration, by muddy relatives, friends, neighbors, kids, and a stand-by kaleidoscope of curious, neighborly dogs.

Approaching the building, the heavy posts support the extended, house-long south-facing porch. A well-made pastel moss-green metal roof caps all and extends out over the porch where it allows us to warm in the low winter sun, and shades us from the straight-up, hot summer sun – summer temps here are often in the 90s – thank goodness it’s a dry heat.
melded into an awesomely-skilled, cooperative, friendly, team; and Casa Colibrí sailed through to final inspection without one correction.

It isn’t finished and we’re fortunate that we have no actual deadline. We have been adding sculptural clay elements to the interior walls and tiling the hearth for the woodstove. It will never really be “finished” and we are happy with that. Kim and I call it our palette, our place to work on and in – Paul did the work, now we get to play.

To us, Colibrí was never just a “structure” and I’m convinced that is true for all straw-bale homes and straw-bale people. Straw is special and it grows in you, and you love to share and pass it along. It is the dirt and growth and wood that comes up and out of the soil and through our hands. Our studio was a special place from the first thought twinkle to now when we can walk inside and be embraced by its ambiance. I won’t apologize for any of my flowery romanticizing because it is spoken by almost everyone who steps inside Colibrí ... I’m just telling it the way it is. Best of all, for us, the loss of our old tractor shed had a positive offshoot: it gave us an opportunity to build a dream far better than we ever expected.

~ Rob Deason
Phil & Ruth McGoohan’s Plaster Work Party

On May 17th, I arrived at the McGoohan residence in Shingletown, CA, in preparation for a plaster work party the following two days. Phil had recently returned from a plaster workshop held at the Steens’ in Arizona. He’d taken down a couple of 5 gallon containers of his own soil, rich in clay, for him and the Steens to work out a recipe for his plaster. Phil and I would be mixing a bunch in preparation for the work party the next day. Phil had me look at a batch made from the recipe and a new mix he had prepared. After putting our heads together, we decided to stick with the original recipe which I felt had a better feel. Phil had prepared a nice mud reservoir using a number of bales put together in a rectangle with tarps draped over them to form the banks and, of course, running down and across the reservoir to hold the mud. We put 2x8 planks down with a plywood cap to run our wheelbarrow up and dump the mud. In short order, we had half the reservoir filled up and covered for the night with a tarp. Thank you Mr. Mixer.

We began the next day with a crew of four. Phil, his sister Catherine, Lee (a friend), and myself. Phil decided to do the inside of the building first. I had brought a metal plank, sheetrock benches, ladders, mixer, various small tools, and a bunch of wooden trowels (and some carpentry tools in case of emergencies). We set up the metal plank on top of the benches and started plastering from the top down. As we finished the top, we moved the plank forward and the crew handling the middle and base of the wall moved in. As we moved forward, we regularly checked the depth of the mud with a straight 2x4 against the wall. We were looking for a 5/8” to 3/4” gap between the mud and the 2x4 when we held it against the plaster stops.

Some time in midmorning, Robert, a neighbor, showed up and jumped right in. The weather was perfect, warm but not too warm. We had Lee making the plaster and he went to it like a politician goes to the money. We never had a want for plaster.

At the end of the day, we had the inside’s first coat on and looking good. All jumped in with the cleaning, leaving a nice clean tidy site to return to the next day. This was so important seeing as everyone was tired by then. Too often, I have witness people dropping the tools where they stand and walking away, leaving what I call “the worker bees” to clean up. Not so with this group, they were all worker bees.

We went on to well-deserved showers and then a meal prepared by the #1 Worker Bee (in my opinion) Ruth, who had kept all of us fed all day. I do not believe any of us had any trouble sleeping that night.

Saturday, Day 2. Our crew was the same at the start of the day. Our mission was the outside. For the most part, the building has a 12’ shed roof surrounding it so, regardless of the weather, one is under cover. Perfect. And the ground had road base, leveled out evenly, making for a remarkably stable work surface to set ladders on – it does not get any better than that.

We started on the side that would get the afternoon sun so that it would have some cool set-up time prior. This would put us in the shade on the opposite side in the afternoon. Shortly after starting, who should arrive but Ray Sheehy and Sally Fuerstenberg. As anyone who knows them can testify to, they are both worker bees and they both jumped into the fray. We now had a team that I would put up against anyone’s. No Queen bees here! And to make matters better, all had good senses of humor.

Phil was worried about the adhesion of the burlap that bridged some of the wood and Hardi Frames. The burlap came from recycled coffee bags and I felt at the time that it was a little too thick. Regardless, we had used it and now needed a quick fix. Phil mixed up some new slip and went around re-slipping anywhere he felt needed it while I fired up my compressor and added staples to various pieces. The end result looked pretty good.

The place buzzed like a lilac bush in flower covered with worker bees collecting nectar. Lots of laughter, really bad jokes, and more laughter. Lunch, served by Ruth, was great. Phil managed to just stay ahead of the plaster group with his slip. And, once again, everyone...
jumped in to do the clean up at the end of the day. Sup- per was excellent and the company could not have been better. Shortly after supper, Ray and Sally slipped into their tight lycra outfits, jumped into the Bat Mobile and were gone like the superheros that they are. We don’t call them the Deadly Duo for nothing (I just don’t understand what Sally keeps calling Ray “Robin.”)

The next day, after loading up the tools, it was my turn to disappear. First, we made an additional five or so buckets of plaster for Phil to use in any shallows or depressions he found. Phil didn’t think we would get the first coat on the entire building in three days. Rightly so, we did it in two. And both days we stopped at a decent hour so as to enjoy the group’s company. Perfect.

All in all, I want to thank our team, Phil, Ruth, Cathy, Lee, Robert, Sally and Ray not only for a job well done but also a very enjoyable time.

~ Bill Donovan, the Slave Master

Discussed were other regional exposure possibilities such as workshops, bale raisings, energy center speakers, code related seminars, as well as CASBA booth at events and photo tours. It was suggested we also keep a list of upcoming bale raisings and seminars on the website.

C.J. Cavet is stepping down as workshop coordinator and will help the new coordinator, Jaclyn Butler, with the transition. It was decided that the workshop projects need to be smaller so we can offer more affordable one day workshops.

The topic of executive director(s) to succeed Maurice and Joy in the future was raised. The qualifications would be non-profit management, communications, enthusiasm for straw building, accounting.

Ray Sheehy and Jim Furness will be the new Dance and Decorating Committee at the conferences.

An Outreach/Marketing Committee was formed.

The board approved contributing funds to Martin Hammer to help with expenses for his work on the building code.

Term limits were set for Advisory Board Members. The board will serve term limits of 3 years, which can be re-upped. New members will be approved by the board.

The Web Store is on hold awaiting further development. PayPal will continue to be used on the website for the ease of paying for membership and conferences.

A special “straw bale homeowners” CASBA membership category was suggested.

The Detail Book is moving along and, with the ambition of the Berkeley Group and others, will be ready for publishing in time for the International Straw Builder’s Conference in September.

The meeting was adjourned with a list of decisions and actions to accomplish.

~ submitted by Kathy Gregor
Project Profile of the Quarter

Name: Vine Hill Road Straw-Bale Home and Caretaker Unit
Location: Western Sonoma County, CA
Use: residence
Interior sq ft: 2427 sq ft main house
+ 633 sq ft caretaker unit
Features: see description
Architect: Arkin Tilt Architects

This home and caretaker unit are the centerpieces of a rural retreat for a professional musician and her psychologist husband. Straw-bale construction was a natural fit to their horse rescue work at the site, and also a perfect choice for the climate and rural setting. The owners embraced this choice, and were particularly enthusiastic during the bale-raising — friends and volunteers placed approximately 300 bales into the ‘I’-joist frames, while Marvin’s father entertained the crew with classical violin. It is clear that their participating in the physical construction or their home has made the process much more significant to them.

Located on 15 acres in western Sonoma County, California, the site was a former Christmas tree farm. These overgrown non-native conifers were cleared to reveal majestic oaks and redwoods, and the buildings were carefully sited to preserve and appreciate them. The main house is just to the east of a stand of redwoods providing welcome afternoon shade during summer months without blocking the sun during winter. The three wings of the project — guest bedroom & studio, main living-dining-kitchen space, and master bedroom suite — each enjoy a passive solar orientation. Together they surround a courtyard that extends the homes relatively modest 2427 sq. ft. of living space to the outdoors. The public space opens up to the courtyard via large sliding doors, whereas each of the sleeping spaces maintains privacy by focusing on the trees beyond.

The house maximizes southern winter sun exposure: a clerestory within the locally harvested Douglas fir ceiling welcomes direct winter sun into the main living space, where it hits the exposed board-form concrete wood-burning insert mass and the lime plaster finish on the straw-bale walls. Roof overhangs and trellises supporting vines shade the windows and doors in summer and fall.

The entry is designed to feel as though it were a part of the trellis that extends across the south side of the great room, only glassed in and covered so it affords some protection and a link to the laundry and guest bedroom wing. The hall to the master bedroom is similarly...
glassed to feel as though one moves outdoors between straw-bale structures. The ‘music bay’ in the northwest corner of the living room is a low-ceilinged, glass-walled retreat within the taller, more solid volume, with a stunning view of the trees to the west.

An efficient radiant heating system is supplemented with four solar hot water collectors, and a photovoltaic system provides grid-intertied renewable energy. The PV features a small battery back-up tied to ‘mission critical’ circuits to bridge somewhat frequent power outages. The PV panels are located on the roof of a storage shed adjacent a two-car parking trellis; no garage is provided.

Uphill from these is a 663 sq. ft. caretaker unit, which keeps a watchful eye on the prefabricated barn and corral for several rescued horses. This in-law unit is a simple yet elegant straw-bale volume with a single roof pitch but stepping floor for a more intimate scale at its bedroom and bath.

Salvaged doors and custom tile compliment the earthy lime plaster finish on the straw-bale walls; the distinction between indoors and out is delightfully blurred.

~ Arkin Tilt Architects
www.arkintilt.com

--- Reader Feedback ---

Dear all,

I was a little bit surprised and irritated when I read the article “Plaster – An Ecological Material for Restoration and Construction” in the last issue of the CASBA Journal, promoting the use of gypsum plaster on straw-bale construction.

First, I believe that the author makes a confusion, voluntary or not, when he uses the word “plaster”. The origin of the word “plaster” comes from the French word “platre”. The correct translation is “gypsum”. Incorrect translation such as entrees, refuse, location, etc. are common in the American language. I believe that the real translation of the title should have been “Gypsum – An Ecological Material for Restoration and Construction”. Equally, the correct translation of their website www.platre.com is gypsum.com and not plaster.com.

But the real concern is to see somebody promoting the use of a gypsum plaster (without aggregate) on a strawbale structure. We all know the advantages and disadvantages of gypsum. It is a fine material for interior, but completely inappropriate for exterior. A plaster made of gypsum and lime will not last more than 10 years. Gypsum is 10,000 times more soluble with water than lime and acts like a sponge (have you ever seen a shower plastered with gypsum?). Its freeze-thaw resistance is less than mediocre and its aggression towards metal creates a new challenge when using a metal lath or other metal parts.

It is correct to say than gypsum plasters have been used extensively around Paris in past Centuries. However, these plasters did not last, and today conservators refuse to repeat the same mistake by specifying lime plaster for preservation and restoration.

There are no bad materials, just bad applications. This mistake can be very painful for the home owner.

Michel Couvreux
TransMineral USA, Inc.
707-769-0661
transmin@sonic.net
www.limes.us

If you would like your project profiled here in the Journal, please send photos (no more than 1 MB each) and info to rebecca@simpleconstruct.net

Please feel free to send your letters, comments, or other feedback about the Journal and its contents to the editor: rebecca@simpleconstruct.net
The journal is produced four times a year. It relies on receiving submissions from CASBA members. Please send your articles, letters, photos, project profiles, etc. to the editor at: rebecca@simpleconstruct.net

The next deadlines are: Sept 22, 2012 and Dec 21, 2012.

Thank you! ~ Rebecca Tasker, editor

CASBA is a non-profit organization whose members are architects, engineers, builders, and people interested in straw building. Our mission is to “further the practice of straw bale building by exchanging current information and practical experience, promoting and conducting research and testing, and making that body of knowledge available to working professionals and the public at large.”

For tons more info and to register, go to www.strawbaleconference.com

Presenters for the 2012 International Straw Builders’ Conference Announced

David Eisenberg has been added as a Featured Speaker.

The Session Speakers & Workshop Facilitators will be:

Frank Tettener  David Arkin  August Hasz
Richard Presley  Laura Seraydarian  Hana Bottger
Bill Schumacher  Bruce King  Sarah Seitz
Michel Couvreaux  Ingrid Cyrns  Dawn Smith
Jacob Deva Racusin  Will Johnson  Tracy Thierot
Andrew Phillips  Andy deGruchy  George Nez
Jonathan Smolens  André de Bouter  Doug Beall
Andrew Thompson  David Belsey  Bob Theis
Melinda Zytaruk  Emily Niehaus  Johnny Weiss
Kyle Holzhuetter  PennEllys Droz  Michel Vital
Sukita Reay Crimmel  Bohdan Dorniak  Bob Gough
Caroline Meyer White  Brian Fuentes  Min Hall
Surkhab Khan  Catherine Wanek  Liz Johndrow
Darcey Donovan  Dodson Harper  Dan Chiras
Martin Hammer  Maya Avinâ  Scott Howard
Doug Eichelberger  Derek Roff  Don Smith
Mark Schueneman  Chris Magwood
Herwig Van Soom  Bill Lucas-Brown

The journal is produced four times a year. It relies on receiving submissions from CASBA members. Please send your articles, letters, photos, project profiles, etc. to the editor at: rebecca@simpleconstruct.net

The next deadlines are: Sept 22, 2012 and Dec 21, 2012.

Thank you! ~ Rebecca Tasker, editor