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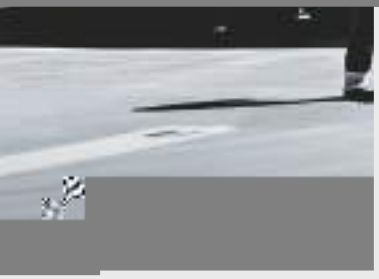
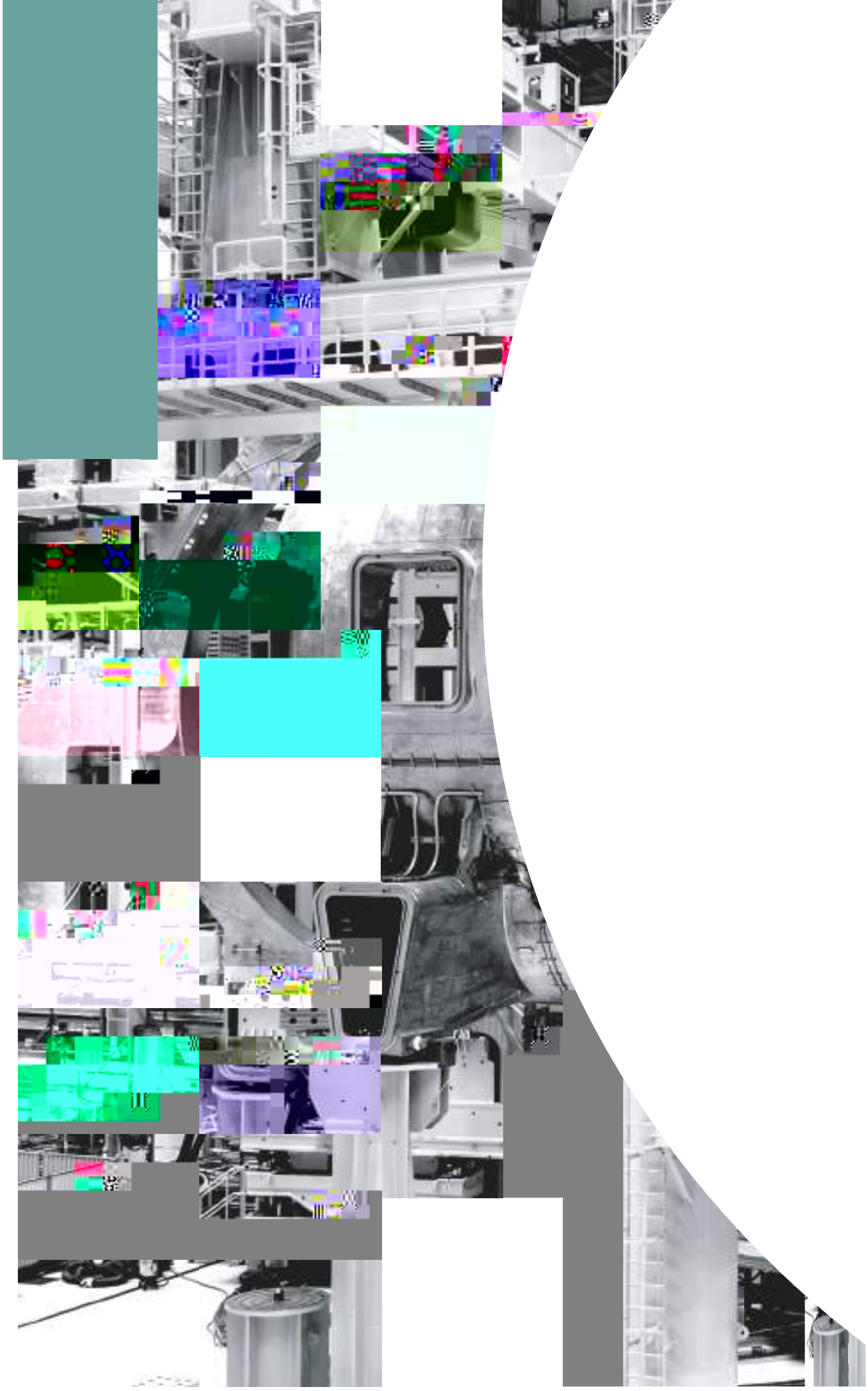
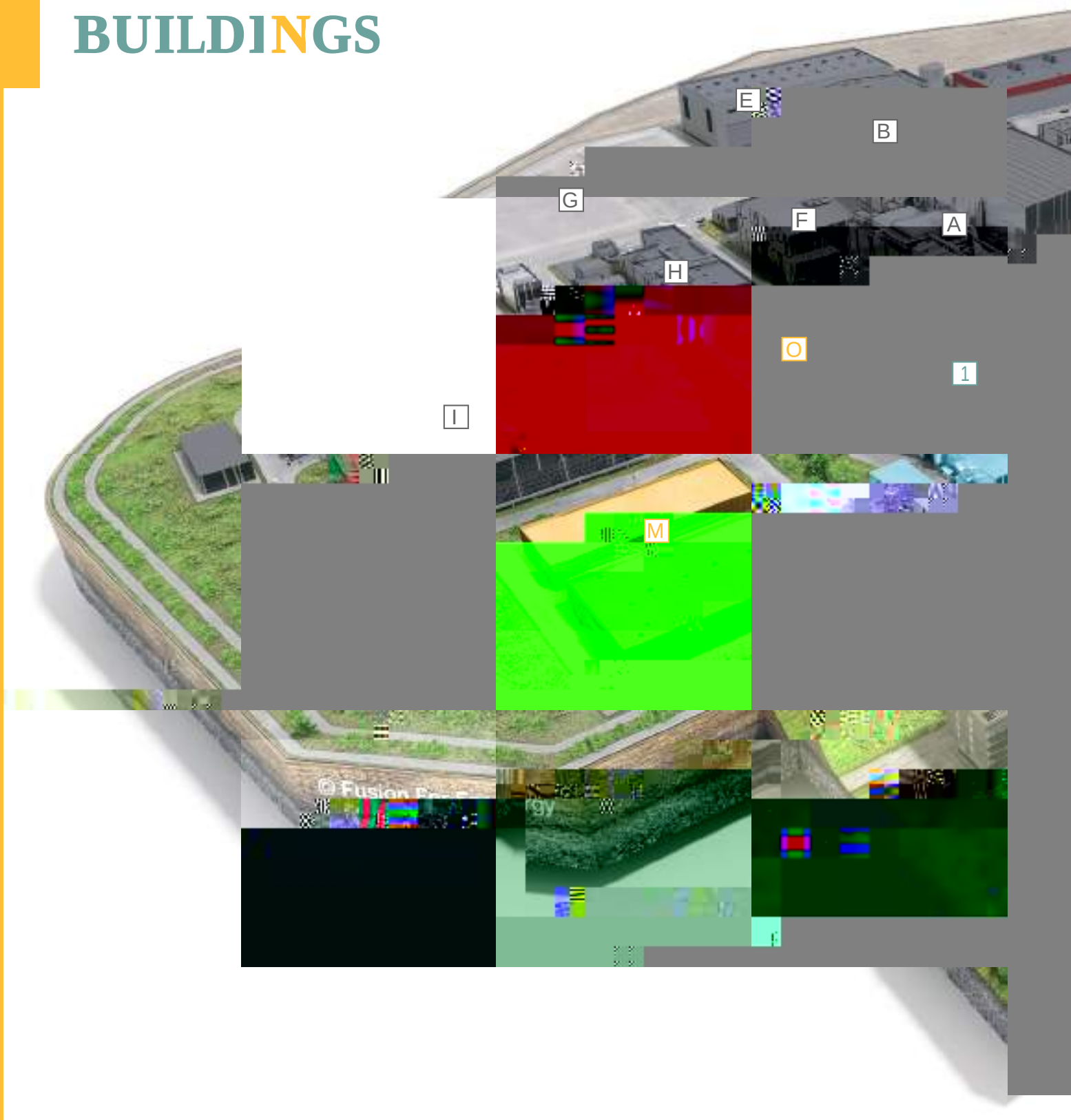




BUILDINGS



Buildings in place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N

uΛ ᴺᴶᴺᵠᵢ ʌţÑ ηŒæÏÑQʌ ¢DZÑΛʌ¢ ÑDZ ĂΛDZ ₩ĂÅ¢DZĂʌÑDZ ʌţÑ repair strategies for the ITER vacuum vessel sectors and thermal shield and, on this basis, concluded repair and re-manufacturing contracts; the teams are now preparing to hand the components off to the QæɃηĂΛ¢Ñrş ñÑQʌæŒ ɃæDZʔÅÑ Sʃ ⊐Ăr Å¢ÊʌÑDZ æʔʌ æÊ ʌţÑ Tokamak pit and returned to tooling in the Assembly oĂÅÊ ÔæʔŒ ʌæŒæ¢DZĂÅ ˛ ÑÅDZ Qæ¢År ⊐ÑŒÑ DZÑʌĂQţÑDZ ÔŒæɃ rÑQʌæŒr Sʃ ĂΛDZ Sᵗ ræ ʌţĂʌ ʌţÑ rÑQʌæŒ ĶÑ₩ÑÅ ŒÑî¢æΛ could be accessed for repair, and the thermal shield rÑʌr ⊐ÑŒÑ ŒÑɃæ₩ÑDZ ĂΛDZ rʔŒ₩ÑʳÑDZş MʲÑQʔʌ¢æΛ æÊ ʌţÑ repair lifecycle—from the start of repair work to the completion of repairs and the resumption of machine assembly—will be closely tracked by a dedicated task ÔæŒQÑş uʌ ¢r ÑʲηÑQʌÑDZ ʌţĂʌ rʔĶ₩ĂrrÑɃĶÅʳ ĂQʌ¢₩¢ʌ¢Ñr ⊐¢ÅÅ ĶÑ ĂĶÅÑ ʌæ ŒÑ₩rʌĂŒʌ æΛʌ⊐æ rÑQʌæŒr ¢Λ ᴺᴶᴺᵠş

– Two vacuum vessel sectors will be ŒÑηĂ¢ŒÑDZ ₩ÑŒʌ¢QĂÅʳ ¢Λ ʌţÑ !rrÑɃĶÅʳ =ʔ¢ÅDZ¢Λî$ Ă ʌţ¢ŒDZ will be repaired in a horizontal position in the former >ŒʳærʌĂʌ ğæŒ₺rţæη$ éÑηĂ¢Œr ʌæ ŒÑQæ₩ÑŒ ΛæɃ¢ΛĂÅ geometry will be a combination of weld build-up ĂΛDZ ŒÑ₩ɃĂQţ¢Λ¢Λîş ʌæ ʌţ¢r ÑΛDZ¦ ʌţÑ ɵʔĂÅ¢ QĂʌ¢æΛ æÊ procedures and tools is ongoing and test specimens (“coupons”) will be subject to detailed metallurgical ĂΛĂÅʳr¢r ĂΛDZ ɃÑQţĂΛ¢QĂÅʌÑrʌ¢Λîş éÑηĂ¢Œ æÊ rÑQʌæŒr Sᵗ ĂΛDZ Sʃ ¢Λ rʔĶ₩ĂrrÑɃĶÅʳ ʌææÅ¢Λî ĂŒÑ Ñʲη ÑQʌÑDZ ʌæ ĶÑ ˛ ΛĂÅ¢'ÑDZ ¢Λ !ʔîʔrʌ ĂΛDZ ÃQʌæĶÑŒ ᴺᴶᴺᵠ ŒÑrηÑQʌ¢₩ÑÅʳĘ ĂÅæ⊐¢Λî ɃæDZʔÅÑ ĂrrÑɃĶÅʳ ʌæ ŒÑrʔɃÑş fæŒʌţÑ rÑQʌæŒr not yet delivered to the ITER site, deviations from nominal in the bevel joint region from the same root cause (welding deformation) have been mapped for ¢ΛẁÊĂQʌæŒʳ ŒÑηĂ¢œş ÿæ ŒÑræÅ₩Ñ ¢rrʔÑr ⊐¢ʌţ ʌţÑ QææÅ¢Λî circuit of the vacuum vessel thermal shield, seven sets will be repaired by removing old cooling pipes and re-welding new ones, while two other sets will be completely refabricated; contractors have already rʌĂŒÑDZʌţÑ¢ĂQʌ¢₩¢ʌ¢Ñrş ÿţÑDZÑQ¢r¢æΛ ʌæ ŒÑηĂ¢ŒÑÅÑɃÑΛʌr of the support thermal shield on site has been made, while the strategy for the in-pit repair of the lower QŒʳærʌĂʌ ʌţÑŒɃĂÅ rţ¢ÑÅDZ¢r rʌ¢ÅÅ ¢Λ DZÑ₩ÑÅæηɃÑΛʌş

– While repair of the vacuum vessel and thermal shield are underway, assembly and installation activities continue to ηŒæîŒÑrr¢Λr¢DZÑ ĂΛDZ æʔʌr¢DZÑ æÊʌţÑ ÿæ₺ĂɃĂ₺ >æɃηÅÑʲş ÃÊ ĂηηŒæʲ¢ɃĂʌÑʳ ᵑᴶᴶ rÑîɃÑΛʌr æÊ ɃĂîΛÑʌ ÊÑÑDZÑŒr ʌæ ĶÑ ¢ΛʌÑîŒĂʌÑDZ Ăʌ =ᴺ ĂΛDZ ¬ᵠ ÅÑ₩ÑÅᵢ ʃᴺ ţĂ₩Ñ ĶÑÑΛ installed and work is advancing on the hundreds of ţ¢îţʳ ʌÑQţΛ¢QĂÅ Ÿæ¢Λʌr ʌţĂʌ QæΛΛÑQʌ ʌţÑɃş ÿÑĂɃr are also creating the coaxial joints needed by the QÑΛʌŒĂÅ ræÅÑΛæ¢DZ rʌĂQ₺ ¢Λ ʌţÑ !rrÑɃĶÅʳ oĂÅÊ ⊐ţÑŒÑ ʌ⊐æ ɃæDZʔÅÑr æÊ r¢ʲ ĂŒÑ Λæ⊐ ¢Λ ηÅĂQÑş uΛ ʌţÑ îĂÅÑŒ¢ÑrQ of the Tokamak Complex, which was turned over to the ITER Organization in September after European Domestic Agency contractors completed all civil engineering works, teams are installing cryolines, warmlines, electrical busbars, cables, and piping on ʌţÑ¢ ĂrræQ¢ĂʌÑDZ rʔηηæŒʌrş ÿţŒÑÑ Ă?ʲ¢Å¢Ăʳ QæÅDZ Ķæʲ¢Ñrᵢ

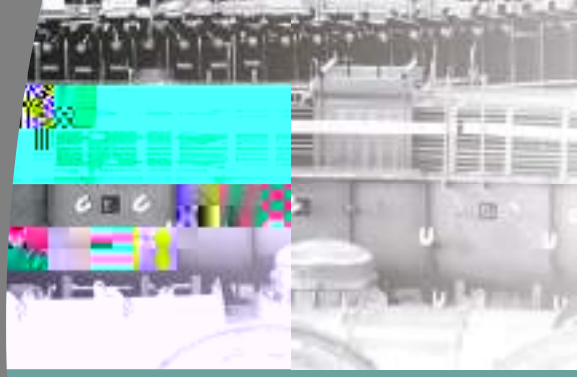
THE PLANT

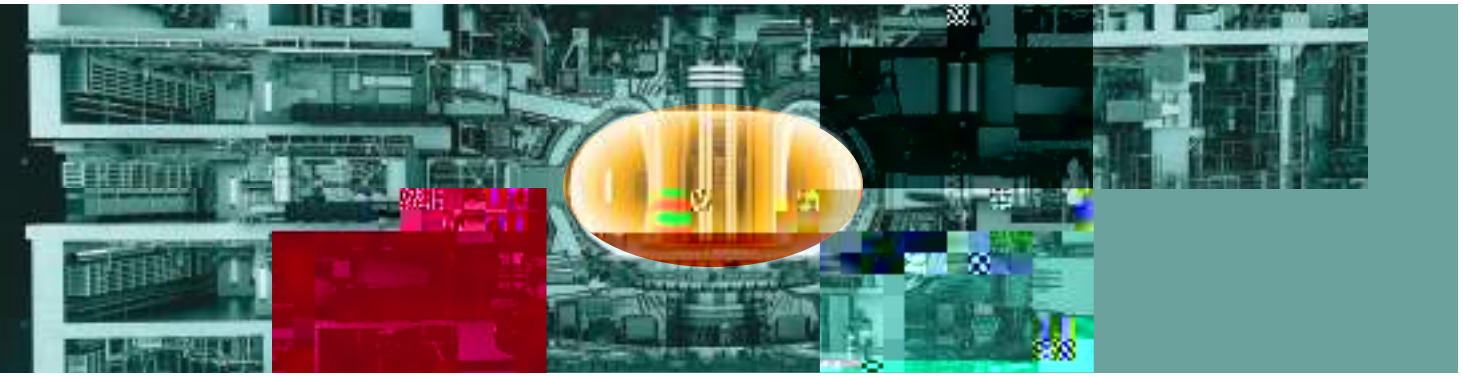
¢ΛrʌĂ₳₳ÑDZ ₳ĂʌÑ ¢Λ ʌţÑ ʳÑĂœş ¶ÑQţĂΛ¢QĂ₳ ĂΛDZ Ñ₳ÑQʌœ¢Q Qɐ Ƀ ηɐΛÑΛʌ installation continues in the radiofrequency heating building, the magnet power converter bays, the cryobridge and ʌţÑ >ɐΛʌœɐ₳ =ʔ¢₳DZ¢Λîşǃʌrɐ ɐŘ ΛɐʌÑī Ă₳₳ Q œ¢ʌ¢QĂ₳ ĂrrÑƁ ǩʌʳ ĂΛDZ installation contracts have been revised and updated according to the recommendations of an expert panel of the ITER Council ¶ĂΛĂîÑƁ ÑΛʌ ǃDZ₩¢ɾɐœʳ >ɐ Ƀ ¢ʌʌÑÑş ¶ʔ₳ʌ¢ηʌ₳Ñ ΛÑîɐʌ¢Ăʌ¢ɐΛr resulted in revised contractual conditions that optimize ηÑœŘɐœ Ƀ ĂΛQÑ ĂΛDZ œÑDZʔQÑ ¢ΛDZ¢œÑQʌ Qɐrʌrş

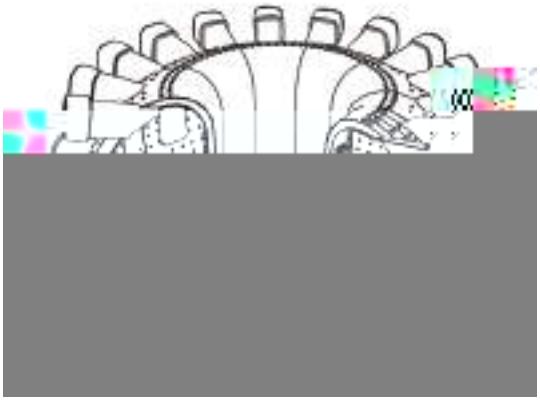
>oǃ¸gMñ éM¬ǃÿME ÿÃ éM₩=ǃñM¬ᵘ¸ᵘ¸g – The ITER Ãœîî ĂΛ¢'Ăʌ¢ɐΛ ţĂr ΠɐœŁÑDZ Π¢ʌţ ɵʔĂ₳¢ ÑDZ ¢ΛDZʔrʌœ¢Ă₳ ηĂœʌΛÑœr ɐΛ a risk-reduction strategy for vacuum vessel in-pit welding, with ʌţÑ ɐǩŸÑQʌ¢₩Ñ ɐŘ ǩÑʌʌÑœ QɐΛʌœɐ₳₳¢ΛîΠ ÑDZ DZÑŘɐœɃĂʌ¢ɐΛrşÿţÑœÑrʔ₳r of a study on nine-sector simultaneous welding will be reported ΛÑʲʌʳÑĂœş ǃ Qɐ Ƀ η₳ÑʌÑ ʔηDZĂʌÑ ɐŘʌţÑ DZÑr¢îΛ ɐŘʌţÑ oɐʌ>Ñ₳₳ fĂQ¢₳ʌʳ will also be necessary given some of the assumptions contained in the new operation plan (beryllium removed as plasma-facing material; lower dose rate in phase one deuterium-tritium ɐηÑœĂʌ¢ɐΛ₩Ş ǃ ηœÑẇQɐΛQÑηʌ ɐŘ ʌţÑ ŘĂQ¢₳ʌʳ ʌĂŁ¢Λî ¢Λʌɐ ĂQQɐʔΛʌ the revised requirements will be the object of a facility design œÑ₩¢Ñ Π ¢Λ ᴺᴶᴺᵠş ǃ₳rɐ Ăr ηĂœʌ ɐŘ ʋÿMé œÑẇǩĂrÑ₳¢ΛʌîŘ Ă Π¢ΛDZɐΠ ɐŘ opportunity has opened for the testing, as a risk mitigation ƁÑĂrʔœÑ ɐŘ rɐƁÑ ɐŘ ʌţÑ ʋÿMé ʌɐœɐ¢DZĂ₳ ÑDZ QɐʌʳĂr Ăʌ ᵠ ©Ñ₳₩¢ΛşThe design of the magnet cold test facility, making use of some of the resources of the ITER cryogenic plant, has been Qɐ Ƀ η₳ÑʌÑDZ ĂΛDZ ηœɐQʔœÑ Ƀ ÑΛʌ ¢r ¢Λ ηœɐîœÑrrş f¢ΛĂ₳ʳŘ DZʔÑ ʌɐ a planned upgrade of electron cyclotron resonance heating ¸M>é o¸Řœɐ Ƀ ᴺᴶ ¶ ğ ʌɐ ʃᵗ ¶ ğŘʌţÑ éĂDZ¢ɐŘœÑɵʔÑΛQʳ =ʔ¢₳DZ¢ΛîΠ¢₳₳ œÑ₩ÑœʌʌɐţɐʔrʌîM>é o Ñɵʔ¢ηƁÑΛʌ ɐΛ₳ʳ ĂΛDZ Ă ǩʔ¢₳DZ¢ΛîŘɐœ¢ɐΛ QʳQ₳ɐʌœɐΛÑɵʔ¢ηƁÑΛʌ Π¢₳₳ ǩÑ QɐΛrʌœʔQʌÑDZş

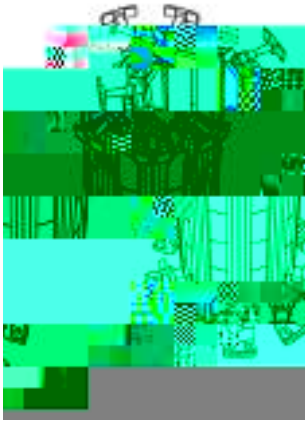
– One of the longest-lead procurement programs of the ITER project—superconducting ƁĂîΛÑʌrṽ¢r Qɐ Ƀ¢ΛîʌɐĂΛ ÑΛDZ Ăr¸ ₩Ñ ʌɐœɐ¢DZĂ₳¸ ÑDZ Qɐ¢₳rŗ ʌΠɐ ηɐ₳ɐ¢DZĂ₳¸ ÑDZ Qɐ¢₳rŗ ĂΛDZ ʌΠɐ QÑΛʌœĂ₳ rɐ₳ÑΛɐ¢DZ ƁɐDZʔ₳ÑrΠɐ DZÑ₳¢₩ÑœÑDZ DZʔœ¢Λî ʌţÑ ʳÑĂœş ǃ₳₳ ᵑᵘ ʌɐœɐ¢DZĂ₳¸ ÑDZ Qɐ¢₳r ĂœÑ Λɐ Π ɐΛ rʌÑş ɐΛ₳ʳ ɐΛÑ ηɐ₳ɐ¢DZĂ₳¸ Ñ₳DZ Qɐ¢₳ ĂΛDZ ʌţœÑÑ QÑΛʌœĂ₳ rɐ₳ÑΛɐ¢DZ Ƀ ɐDZʔ₳ÑrœÑƁĂ¢Λ ʌɐ ǩÑ DZÑ₳¢₩ÑœÑDZş EÑ₳¢₩Ñœʳ ĂΛDZ ĂQQÑηʌĂΛQÑ ɐŘ ʌţÑ¸ ₩Ñ œÑƁĂ¢Λî ₩ĂQʔʔƁ ₩ÑrrÑ₳ rÑQʌɐœr ṽ ɐΛÑŘœɐ Ƀ ©ɐœÑĂ ĂΛDZ ¸ ₩Ñ Ŕœɐ Ƀ MʔœɐηÑ ṽ œÑƁĂ¢Λ ɐΛ ʌţÑ ηœɐÿÑQʌŷr Qœ¢ʌ¢QĂ₳ ηĂʌţ ĂΛDZ ĂΛʳ DZÑ₳Ăʳ ¢r Ă ƁĂÿɐœ œ¢rŧ ʌɐ ʌţÑ rQţÑDZʔ₳Ñş

– A major push to improve the ʌÑQţΛ¢QĂ₳ ɵʔĂ₳¢ʌʳ QʔʌʔœÑ ¢Λ ʌţÑ ηœɐÿÑQʌ ΠĂr QɐΛDZʔQʌÑDZ ¢Λ ᴺᴶᴺᵠ ʌţœɐʔîţŗ¸ œrʌŗ Ă rÑœ¢ÑrɐŘ ηœɐÿÑQʌẇΠ¢DZÑ rʔœ₩Ñʳr ĂΛDZ ¢ΛʌÑœ₩¢Ñ Π r with experts from other major projects such as CERN and NASA and, second, a four-day hybrid meeting in April on quality ƁĂΛĂîÑƁ ÑΛʌ ¢rrʔÑr ¢Λ DZ¢ŘŘÑœÑΛʌ ʌÑQţΛ¢QĂ₳ ĂœÑĂrş ENr¢îΛÑDZ as an open arena for discussion and problem solving, the Technical Coordination Meeting resulted in eight priority œÑQɐ Ƀ ƁÑΛDZĂʌ¢ɐΛr ʌţĂʌ Π¢₳₳ ǩÑ ηœɐ Ƀ ʔ₳îĂʌÑDZ ĂQœɐrr ʌţÑ ηœɐÿÑQʌş









C.

The United States is delivering seven central solenoid modules (including one spare) produced from niobium-tin superconductors supplied by Japan platform where the ITER teams are overseeing the creation and testing of platform where the ITER teams are overseeing the creation and testing of

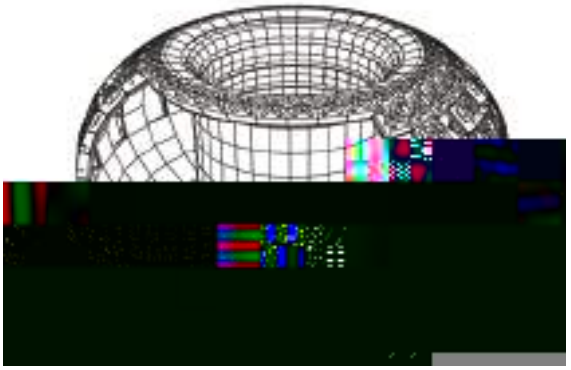
D.

of niobium-tin superconducting strand and the subsequent manufacturing of and inserted into structural cases by Europe Japan coil arrived from Europe in December, approximately three and a half years after

E.

procurement responsibility of Europe, was delivered by Russia Europe has delivered two ring-shaped coils that are already installed in the Tokamak pit

F.



ITER infrared diagnostics have optical components that transfer the infrared radiation emanating from the plasma-ŘĂQ↓Λî Qɐ Ƀ ɳɐΛÑΛʌr ʌɐ QĂ Ƀ ÑŒĂr ʎɐQĂʌÑDZ Ƀ ĂΛʳ Ƀ ÑʌŒÑr Ă∺Ăʳş
The set of planned infrared cameras will monitor a large fraction of plasma-facing surfaces for “hot spots” that can ǩÑ_ Ăî ĵÑDZ ʌɐ ɐɳÑŒĂʌɐŒrş !ʌ Ă ∺ɐŒ‡rţɐɳ Ăʌ ʊÿMé ʌţ↓r ʳÑĂŒ specialists discussed the strategies for calibration that need to be developed, tested and incorporated in the design and ɐɳÑŒĂʌ↓ɐΛ ɳʎĂΛ ɐŘʌţÑ DZ↓ĂîΛɐrʌ↓Qr ʌɐ ÑΛr?ŒÑʌţÑ. DZÑʎ↓ʌʳ ɐŘʌţÑ Ƀ ÑĂr?ŒÑ Ƀ ÑΛʌrş

After a two-year shutdown for upgrades, the SPIDER ʌÑrʌǩÑDZ ĂʌʌţÑ ʊÿMé ¸Ñ?ʌŒĂʎ=ÑĂ Ƀ ÿÑrʌ fĂQ↓ʎ↓ʌʳ ↓Λ æĂDZ?Ă ʊʌĂʎʳ ↓r ŒÑĂDZʳ ŘɐŒ Qɐ Ƀ Ƀ ↓rr↓ɐΛ↓Λî ĂΛDZ ɐɳÑŒĂʌ↓ɐΛş ñæʊEMé ↓r Ă Ř?ʎÅẁ size negative ion source that is designed to demonstrate all the critical aspects of the ion sources for ITER’s neutral beam ↓ΛÿÑQʌɐŒrş MΛţĂΛQÑ Ƀ ÑΛʌ ɐŘʌţÑ ǩÑĂ Ƀ rɐ?ŒQÑ ʊɳţɐʌɐŘ QÑΛʌŒÑỤ


On a dedicated platform

Deliveries continue for the tokamak cooling water system,

ñ¢¡ʌÑÑΛ ʳÑĂŒr ĂŘʌÑŒ ʌţÑ ˛ Œrʌ ɃĂŕΛÑʌ æŒæQʔŒÑɃÑΛʌ Arrangements were signed, Japan and Europe deliver ʌţÑ˛ ΛĂ¼ ʌæŒæ¢ƉZĂ¼˛ ÑƉZ Qæ¢¼r ɐŘ ʌţÑ¢Œ ηŒæQʔŒÑɃÑΛʌ rQɐηÑ¦ ÿţÑ rʔQQÑrrŘʔ¼ĂŒŒ¢ŴĂ¼ ɐŘ Qæ¢¼r ÿf ⁿ¦ɐ¦Ř ÿf ᵗ¦ ĂΛƉZ ÿf ⁿᵘ ŘŒæ Ɂ ¦ĂηĂΛ ĂΛƉZ ÿf ⁿĂΛƉZ ÿf ⁿʰ ų η ţ ɐʌɐ¢Ų Ř Œæ Ɂ M?Œ æ η Ñ ƉZ?Œ ¢ Λ î ʌţÑ ʳÑĂŒ ǩ Œ ¢ Λ î r ʌţ¢r ηŒæQʔŒÑɃÑΛʌ ηŒæ îŒĂɃ ʌɐ ĂΛ ÑΛƉZ¦ ! ¼ ⁿʰ Eŵr ţĂηÑƉZ Qæ¢¼r required by the machine are on site, as well as a nineteenth Qæ¢¼ Ăr Ă r ηĂŒÑ¦ **(16)**

The vacuum vessel team in Europe charged with the ηŒæQʔŒÑɃÑΛʌ ɐŘ˛ ŴÑ rÑQʌɐŒr ɐŘ ʌţÑ ʊÿMé ŴĂQ??Ɂ ŴÑrrÑ¼ ţĂr ǩÑÑΛ Ñʲ η¼æŒ¢Λ î ʌţÑ ǩÑΛÑ˛ ʌr ɐŘ ʔr¢Λ î ĂŒ⁄¢ Q¢ĂŒ¢ΛʌÑ¼¼ î ÑΛQÑ ų ! ʊ ų ʌɐ ηŒÑƉZ¢Qʌ ⊏Ñ¼ƉZ ƉZÑŘÑQʌrʂ Ćr¢Λ î ƉZĂʌĂ ηŒÑŴ¢ɐʔr¼ʳ QɐĂ¼ÑQʌÑƉZ ŘŒæ Ɂ vacuum vessel welds with defects to train an AI model, the

SCIENCE & INTEGRATION

The ITER Research Plan was initially developed to outline the steps of the experimental program through high-fusion-gain deuterium-tritium operation and to incorporate elements of the testing program for tritium breeding technology, the ensuing years to identify the main lines of physics R&D required to support preparation for ITER operation and to incorporate elements of the testing program for tritium breeding technology, to achieving the project's research goals to adapt the ITER Research Plan to new findings that have been proposed as part of the new Project Baseline and the Staged Approach.

The new plans are being elaborated to minimize the impact of delays in the project schedule on nuclear operation as well as to provide a more robust path to ITER operation. The ITER Research Plan exploration is divided into three phases:

Start of Research Operation (SRO): With all in-vessel components installed except the water-cooled divertor, the ITER Research Plan will address Plasma control, protection and disruption mitigation

The ITER Research Plan will address systems are installed and the project goals of production, for 300-500 s pulses are achieved at the ITER Research Plan will address steady-state plasmas) as well as routine operation The second-phase safety demonstration can be

SCIENCE & INTEGRATION

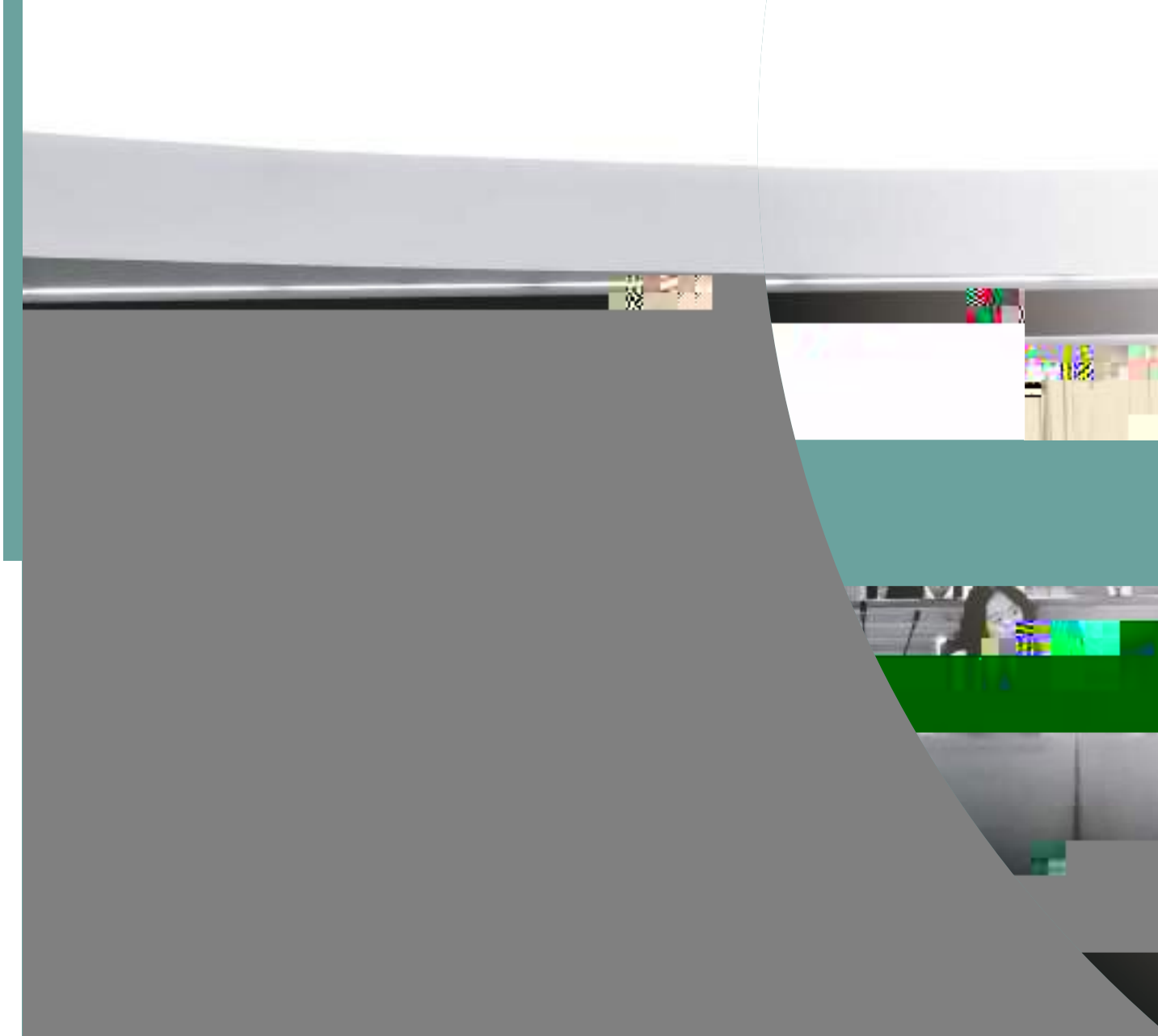
ηţʳrɻQr ĂɅDZ Ƀ ɐŒÑ ŒÑQÑɅʌ Ñʲ ηÑŒɻɃ ÑɅʌĂѦ DZĂʌĂş ÿţÑ ŒÑr?ѦʌṽĂ QɐDZÑ QĂѦÑDZ ¶M¶ ÃñẁĆ ṽ ηœɐ₩ɻDZÑDZ Ă ?Ʌɻ ÑDZ DZÑrQŒɻηʌɻɐɅ ɐR metallic plasma-facing-component melting in magnetic QɐɅ ɅÑɃÑɅʌ DZÑ₩ɻQÑrş ų ! ηĂηÑŒ DZÑrQŒɻǩɻɅî ʌţɻr DZÑ₩ÑѦɐηɃÑɅʌ won the prestigious ¸ ?QѦÑĂŒ ƒ?rɻɐɅ ηŒɻ'Ñ ɻɅ ᴺᴶᴺᵉş Ų ÿţÑ team has since used the understanding it developed to QŒÑĂʌÑ Ă Qɐ Ƀ ηѦÑʌÑѦʳ ɅÑ₰ Ƀ ɐDZÑŒɅ ĂɅDZ _ Ñʲɻǩѧ Ñ Ƀ ɐDZÑѦѦɻɅî tool (MEMENTO) that is the key modelling framework for the evaluation of erosion of tungsten components under ʌŒĂɅrɻÑɅʌr ɻɅ ʊÿMé ĂɅDZ ŒÑĂQʌɐŒ₩rQĂѦÑ DZÑ₩ɻQÑrş

M¸ MégMÿu>Ẅæ ! éÿu>¬MẄE éuĞM¸ u¸ ñÿ ! =u¬uÿuMñ

errors—as for example when a support element is shown slightly “inside” the embedded anchor plate to which it is to ǩÑ ⊐ÑƛDZÑDZş

fȻƛʌÑœȻΛî ɐʔʌ ʌţÑrÑ ȻœœÑƛÑ₩ĂΛʌ ȻʌÑɃr ʌɐ ÑŖ QȻÑΛΛƛr îœɐʔɳ ĂΛDZ QĂʌÑîɐœȻ'Ñ ʌţÑ œÑɃĂȻΛȻΛî QƛĂrţÑr Ȼr Ă Qţ ĂƛƛÑΛîÑş ñɐɃÑ QĂΛ ǩÑ¸ ƛʌÑœÑDZ Ă?ʌɐɃ ĂʌȻQĂƛƛr ǩr Ăɳɳƛr ȻΛî DZȻŖŘÑœÑΛʌ QĂʌÑîɐœȻ'ĂʌȻɐΛ rules, but to work effectively these rules require that the 3D models have been prepared rigorously and that, for example, all the tagging and naming of the elements has been done QɐœœÑQΛƛr? ⊐ ţȻQţ Ȼr ΛɐʌĂƛ⊐Ăr ʌţÑ QĂrÑş

!ƛƛ ȻDZÑΛʌȻ¸ ÑDZ QƛĂrţÑr ʌţĂʌ ĂœÑ ΛɐʌĂ?ʌɐɃĂʌȻQĂƛƛr¸ ƛʌÑœÑDZ ɐ?ʌ Ăr ȻœœÑƛÑ₩ĂΛʌ Ɂ?rʌ ǩÑ QţÑQŁÑDZ ɃĂΛ?Ăƛƛrş ĞĂœȻɐ?r ʌɐɐƛr ţĂ₩Ñ been developed to assist in this process, but once all obvious grouping and cleaning has been done the remaining QƛĂrţÑr Ɂ?rʌ ǩÑ QţÑQŁÑDZ ɐΛÑ ǩr ɐΛÑş uR ʌţÑ QƛĂrţ Ȼr rȻɃɳƛÑ and the solution apparent, preliminary corrective actions are assigned to the “clashing” parties and are recorded in the



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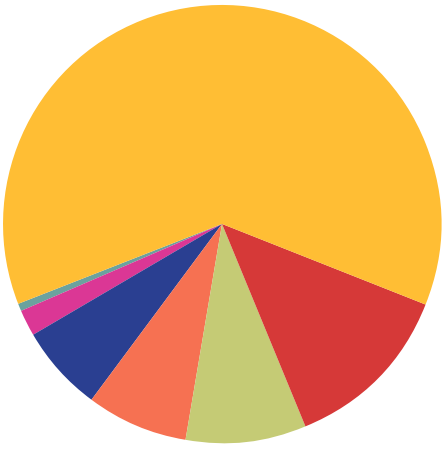
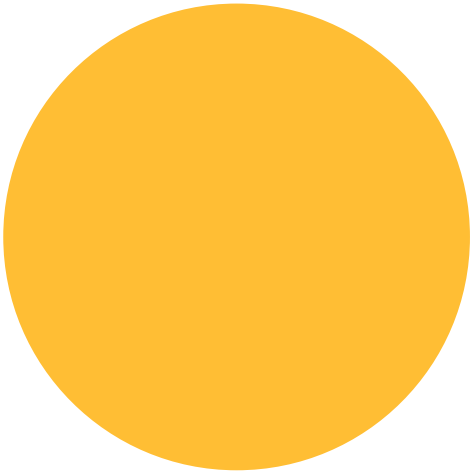
CORPORATE HIGHLIGHTS

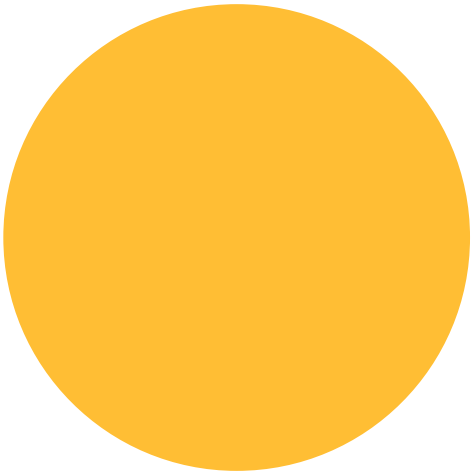
CORPORATE HIGHLIGHTS 2023

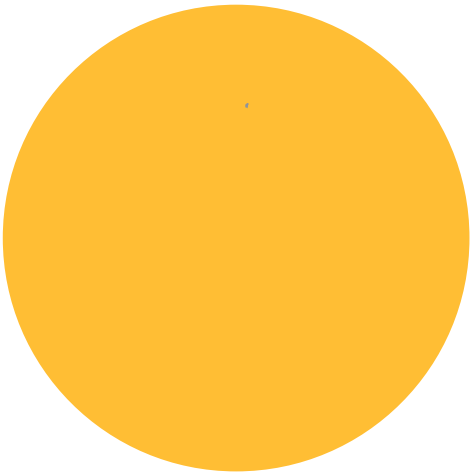
The ITER Organization and the Domestic Agencies continue moving forward expeditiously with

– The ITER Organization is moving toward a fully matrixed organizational structure that will be completed with the implementation next year of the MΛf↓ΛNÑœ↓Λf ñÑœ₩↓QÑr ENÑηĂœʌBÑΛѕ ÃΛÑ ₺R ʌţÑ ₺ǩŸÑQ◊↓₩Ñr ₺R this corporate restructuring is to streamline and improve









DIVERTOR

INNER VERTICAL TARGETS	100%	15.75%
Progress in detailed engineering and qualification for series production (first contract)		
CASSETTE BODY	100%	8.77%
Series fabrication in progress at both contractors		
Transition pieces delivered, contract completed; MRR for pins, sleeves and links contract		
DIVERTOR RAIL	100%	0%

BLANKET

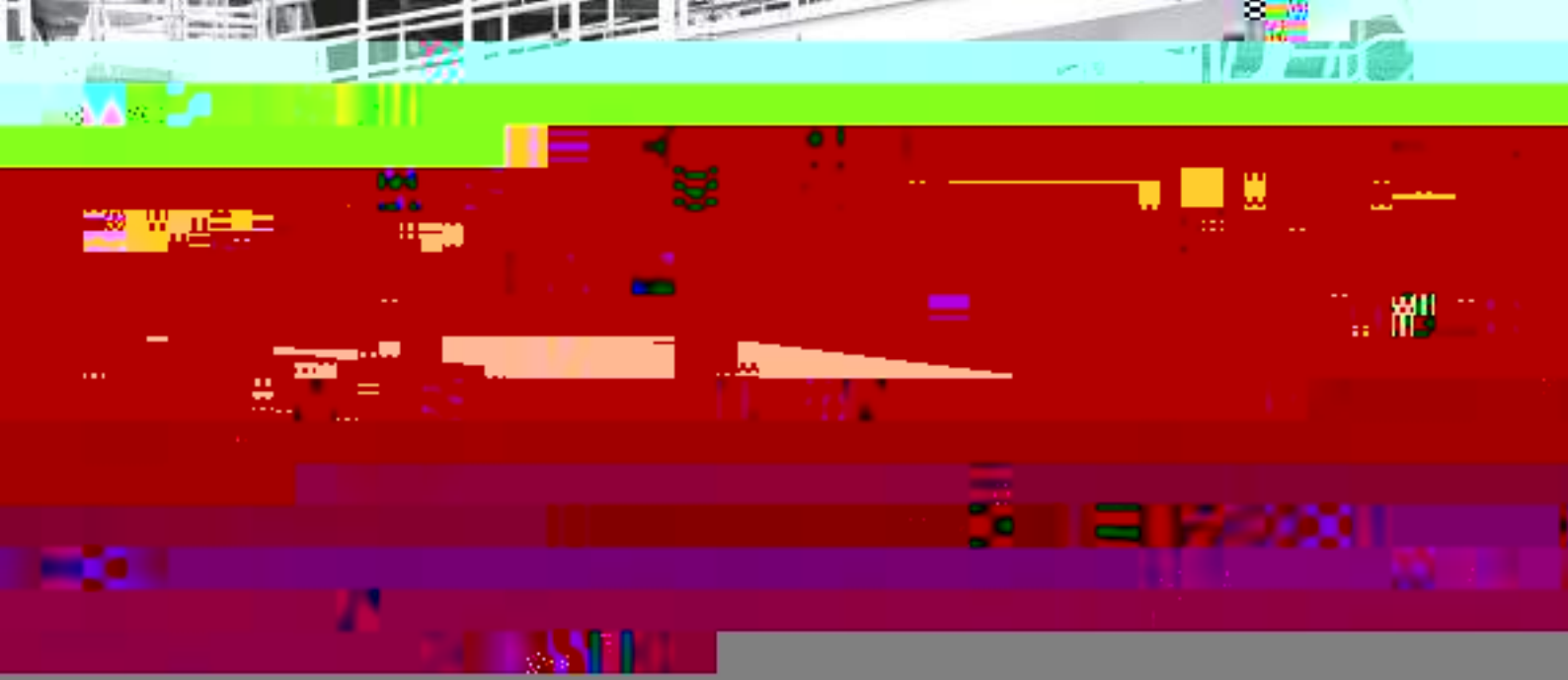
BLANKET FIRST WALL	47.6%	0%
Production lines completed for panel series manufacturing (both contractors); MRR for series production achieved by first contractor		
BLANKET COOLING MANIFOLDS	100%	4.52%
Multi-framework contract for series production signed		
Task orders launched for manufacturing of full-scale prototypes and for procurement of material		

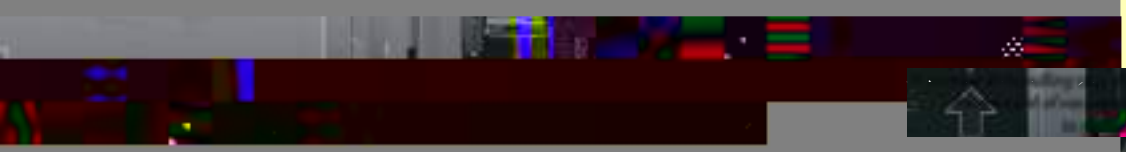
REMOTE HANDLING

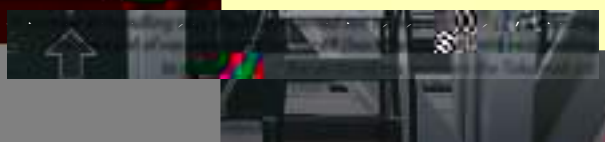
IN-VESSEL DIVERTOR REMOTE HANDLING SYSTEM	100%	0%
Significant progress in the final design and supporting R&D of cassette toroidal (CTM) and cassette multifunction movers (CMM)		
Preparing to tender the design and manufacture of simplified CTM and CMM for first assembly		
CASK AND PLUG REMOTE HANDLING SYSTEM	100%	4.63%
Final design of first assembly casks (equatorial and upper port) completed; manufacturing task order signed		
EX-VESSEL NEUTRAL BEAM REMOTE HANDLING SYSTEM	100%	4.81%
Neutral beam crane final design contract awarded		

INTERNATIONAL COOPERATION

INTERNATIONAL ORGANIZATIONS







LOOKING AHEAD: 2024