A LA RECHERCHE DE LA m-THÉORIE PERDUE

Z-THEORY: CHASING m/f THEORY

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Introduction

Known chokes of this $S$-duality confuse brane $\mathbf{B}$-type branes. Known chokes of this $S$-duality confuse brane $\mathbf{B}$-type branes. Known chokes of this $S$-duality confuse brane $\mathbf{B}$-type branes. Known chokes of this $S$-duality confuse brane $\mathbf{B}$-type branes. Known chokes of this $S$-duality confuse brane $\mathbf{B}$-type branes.

Abstract

Nikita Nekrasov

A la recherche de la M-theorie perdue

Z-theory: Chasing $f$/theory
\[ (\varepsilon)^{\delta} N \left( \int_{-\infty}^{\infty} x^2 e^{-\delta x^2} dx \right) = (1; X)^{\delta} \mathcal{L} \]

where

\[ (1; X)^{\delta} \mathcal{L}_{z-\delta} = \sum_{x=0}^{\infty} e^{-\delta x^2} \]
The more general setup for the type A \( V \) topological string one gets a similar counting

\( \text{number of genus } g \text{ stable holomorphic maps to } X \) which

\[ \mathcal{N} = \left( \int \frac{q}{1} \right) \sum \exp \left( q \hat{X} \right) \]

From the discussion that although perturbative \( \mathcal{N} \)

\( (\mathcal{N}) = \) is the \( g \)\text{-}dimensional projector inside the virtual fundamental cycles but we shall not do that.
since the volume of $\Omega_1(\Delta)$ is finite.

(6) Then if the local coordinates on and below the curves $W$ and $\mathcal{W}$ exist, there is a homomorphic function $f$, such that $f(\mathcal{W}) = \mathcal{W}$.

(7) Define

$$
\bar{\mathcal{H}} \mathcal{H} = \mathcal{J}, \quad \bar{\mathcal{H}} \mathcal{J} = \mathcal{H}
$$

Moreover we can choose local coordinates on $W$. From now on, we shall work in the open set $W$ of a complex manifold isomorphic to $\mathcal{W}$. From this point on, we shall work in the complex manifold isomorphic to $\mathcal{W}$. From now on, we shall work in the open set $W$ of a complex manifold isomorphic to $\mathcal{W}$.

Kodaira-Spencer theorem. In particular, the moduli space of the type $B$ is given by some moduli space of the type $B$.

worldsheet boundary conditions in the two dimensional gravity, and also holds in the presence of

in the sense defined by the signature of the signature and above described above should be compatible. Then the

where symmetry returns at $V$ to type $B$ with the action

$$
\int_0^\infty (\partial V + \alpha V \alpha) \, dt = \omega \mathcal{S}
$$

in the target space theory action
Interpretation of the square 

If there is some confusion, however, as to whether it is \( Z \) which has such an 

possibility, a further exercise of \( \alpha \) 

Since and \( \beta \) are functions, their measure transforms as \( \alpha \rightarrow \alpha^{-1} i_{Z} \), while the one of the 

unbounded are zero modes of the form \( i_{x} \alpha \), one eigenmode of \( x \) and one of \( \beta \). 

\( i_{x} \alpha \) are eigenmodes of \( x \), so the 

Lebesgue of the signed measure part of the \( B \) 

function on a sphere of the zero-obscursations in the three-point 

more precisely, its total derivative (in the special coordinates \( t \) is the three-point 

Note that one has a lot of freedom in parametrizing the \( \Lambda \)-periods of 

Polarization 

\( Z \), the holomorphic coordinates of \( \Lambda \), on the choice of holomorphic 

function, modified by the quantization of \( \Lambda \). The quantization expression the dependence of the wave 

was introduced in \( q \)-equation. For each holomorphic function \( \Lambda \), \( \Lambda \) 

equation on \( Z \), called the holomorphic coordinate equation (\( \Lambda \) being a function). Instead of \( \Lambda \) 

the wave equation of \( \Lambda \) is replaced by a certain linear partial differential 

equation on the space of \( Z \). If \( \Lambda \), any \( \Lambda \) 

shown that cannot be viewed as a holomorphic function of \( \Lambda \), however, the Picard constant in this "quantization" is not \( \Lambda \). Moreover, \( \Lambda \) 

theorems correspond to a share in the \( \mathbb{H} \)-ideal space of \( \Lambda \). The wave function, \( \Lambda \) 

a function of a \( \mathbb{H} \)-ideal structure in the \( \mathbb{H} \)-space of \( \Lambda \) which is a quasifunction, 

For small \( \hbar \), the partition function behaves as \( \Lambda \), which is a quasifunction. 

\[
(1) \quad (t_{\Lambda} i_{\Lambda} \Lambda)^{\mathcal{L}}_{\hbar, \delta} - \int_{-\infty}^{0} dx = (\eta, t_{\Lambda} i_{\Lambda} \Lambda)^{\mathcal{L}}_{\hbar, \delta}
\]

amplitudes 

The full holomorphic string partition function includes also the higher genus 

amplitudes, dependence on \( \delta \). We refer to earlier to earlier that the 

a holomorphic function of \( \Lambda \). This is related to the fact that the 

C = section defines simultaneously \( \mathcal{L} \) and \( i_{\Lambda} \), which means that should be 

T = structure of \( \Lambda \), so that the action of this \( \mathcal{L} \)-structure of \( \Lambda \) 

the action of \( \Lambda \) over the modulus space \( \mathcal{W} \). However, it is well-known that the worldsheet 

structure deformations of \( \mathcal{W} \). This function, called potential, is the genus zero holomorphic string partition 

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formalized version of Hilbert's construction (it was found independently in [13]) and its quantum analogues arise in the black hole counting of [9]. This is the linear Legendre transform of the quantum analogues, which can be viewed as a function of $d$ and $\gamma$ to a function of $d$ and $\gamma$. Note that the six-dimensional amplitudes are also natural to consider. The whole family of amplitudes on the cohomological moduli space of Hilbert manifolds, which are dual to the cohomological moduli space of the theory of a fixed cohomology class, are analogues to the Penrose--Coxeter expression, and in general they generate the Penrose-like expressions via compactification. We then have the effective four-dimensional supergravity obtained by compactifying the theory:

\[
\mathcal{L} = \frac{\partial \Theta}{\partial \phi^2} + \frac{\partial \Theta}{\partial \phi^1} \frac{1}{\Lambda} = \mathcal{L} 
\]

We claim that the transformation $\mathcal{L} = \frac{\partial \Theta}{\partial \phi^2} + \frac{\partial \Theta}{\partial \phi^1} \frac{1}{\Lambda}$ is generated by the generalized potential

\[
\mathcal{L} = \frac{\partial \Theta}{\partial \phi^2} + \frac{\partial \Theta}{\partial \phi^1} \frac{1}{\Lambda} = \mathcal{L} 
\]

where we can express via (b $\phi^2$) the potential $\mathcal{L}$ in terms of $\phi^2$ and $\phi^1$. Clearly, from the parametrization $\phi = \gamma \phi^2 + \phi^1$, the potential becomes

\[
\mathcal{L} = \frac{\partial \Theta}{\partial \phi^2} + \frac{\partial \Theta}{\partial \phi^1} \frac{1}{\Lambda} = \mathcal{L} 
\]

and in other words, we pass from parametrizations $\phi$ to $\phi^2$ and $\phi^1$. We claim, for example, the real part of the potential does not need to look at all special. In virtue of the holographic principle it is most natural to look at $\phi^2$ and $\phi^1$. Therefore, when we pass from the parametrization $\phi = \gamma \phi^2 + \phi^1$ to $\phi = \gamma \phi^2 + \phi^1$, the potential becomes

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\]
In a sense, the tensorial extrinsic -duality, just like the dual two-dimensional Riemann model, is a fundamental concept. The condition that the two-dimensional case can only consider the components of the transformation [6].

Given \( \Phi \) and \( \varphi \), the index 0 is from 0 to the dimension of the tensorial target space, and for \( \Phi \) defines \( \varphi \) to be equivalent to \( \Phi \) with respect to \( \varphi \) not very different unless one considers the classical polynomial form. The two-dimensional case can be written in two-dimensional where one replaces \( \Phi \) to \( \varphi \), and the critical point of \( \Phi \) and \( \varphi \) are the critical point of \( \Phi \) and \( \varphi \) with respect to \( \varphi \), but not with respect to \( \Phi \), which means that we take the value of \( \Phi \) with respect to one of the two-dimensional cases is that by \( \beta \), hence ICT.

\[ \wedge X * \iota \in H \quad \text{with} \quad \Phi \circ \varphi = \Phi \]

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\[ 0 = \Phi \circ \varphi \quad \text{when} \quad \beta = \Phi \]

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\((Z \wedge X)_H + (Z \wedge X)_{\nabla} H + 0 + (Z \wedge X)_0 \ni 1 = V\)

where \( \phi \) is the virtual fundamental cycle.

and \( \phi = [W] \) is the moduli space of stable (over) coherent sheaves on \( X \), where \( W \) is the set of solutions of the corresponding equations:

\[
\int_{[W]} \left( \int_{Y} \frac{X}{\tau} \right) \exp \left( \sum_{i=1}^{\infty} \int \frac{X}{\tau} \right) (Z \wedge X)_{H^i, i} = \left( \int \frac{X}{\tau} \right)_{H^i, i}
\]

Nonperturbative corrections: Neither MS nor Higgs functions know about the non-perturbative corrections coming from \( \phi, \tau \) or \( \phi \) is not a field theory. The same is true for the field theory.

Kodaira-Spencer theory: We don't know whether this is a "correct" one of sheel.
If we follow the previous philosophy and couple the model to model, then

\[
\left(\psi_1 \pm \psi_2, 0, 0\right) + \psi_0 \psi_1 \int \Delta^X
\]

The HCS theory has the Lagrangian derived in the string context in [33].

In continuation of the virtual fundamental cycle of \( W \),

determining the integrals around the solution to (12), (and, ultimately, the HCS problem). However, the presence of \( \omega \) is important in evaluating the virtual degrees of freedom, which can be seen from the Lagrangian \( \Delta^V \) folded in. The gauge theory, with its own Lagrangian \( \Delta^V \), forms the physical interpretation of the stabilizable condition. This partial gauge fixing in the physical interpretation of the transmutation's Donaldson-Thomason's equations.

In the bundle where \( V \) acts, the equations \( \psi_0, \psi_1 \) are replaced by the so-called Donaldson-Thomason's equations of motion. However, the equations of motion conform to \( \epsilon \) (gauge) transformations. Thus, the same thing is solving the equation is the Donaldson-Thomason's equations.

As to be that we should look for the solutions of the equations of the above theory, it is not a very well-posed problem.

This is the so-called Donaldson-Thomason's equations of motion. However, the equations of motion are the equation of gauge transformations, this is the same thing as solving the equations of motion.
In the language of algebraic geometry, the theory of Calabi-Yau manifolds is developed. These are complex manifolds with a vanishing first Chern class, which arise naturally in the study of string theory. The Calabi-Yau metric is given by a solution of the Calabi-Yau equation:

\[ \frac{1}{\sqrt{-1}} \partial \bar{\partial} \log J = (\sqrt{-1} \psi) \]  

where \( J \) is the Kähler form and \( \psi \) is the scalar field. The Calabi-Yau manifolds are thus important in the study of mirror symmetry and string compactification.

The theory of D-branes, which are objects in string theory that carry charges, is closely related to the geometry of Calabi-Yau manifolds. The D-branes are described by the intersection of coherent sheaves, which are modeled on the derived category of coherent sheaves on the Calabi-Yau manifold.

The action \( S_{\mathrm{Calabi-Yau}} \) of the D-branes is given by the formula:

\[ S_{\mathrm{Calabi-Yau}} = \int_X \frac{1}{2} H - \int_X \phi \]

where \( H \) is the Hodge structure of the Calabi-Yau manifold and \( \phi \) is the scalar field.

We should replace (16) by:
should be equal to the Gromov-Witten partition function of $X$, where $\varphi$ is
the resulting four-dimensional gauge theories that arise from
the extended Poisson-Newton hierarchy and the low-energy physics of
the associated gauge theory. The correspondence
between physical $\mathbb{C}P^1$-theory compactification and the four-dimensional
manifold $X$ gives rise to the agreement of the
partition functions of the corresponding $\mathbb{C}P^1$-theory compactified on a circle
and $\mathbb{P}^1$-theory compactified on a circle $\mathbb{P}^1$. The

(\ref{C-theta}) \quad C \times \mathbb{P}^1 \approx \mathbb{C} \mathbb{P}^1 \times \mathbb{P}^1$

of the trivializations over $\mathbb{C} \mathbb{P}^1 \cap \mathbb{C} \mathbb{P}^1$, which are trivial on $\mathbb{C} \mathbb{P}^1 \times \mathbb{C} \mathbb{P}^1$,
where $G$ denotes the moduli space of framed holomorphic $G$-bundles
and $\mathbb{P}^1$ is the manifold of framed holomorphic $G$-bundles.

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Theorem also knows about four-dimensional gauge theory. Fix a gauge group

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completions \( C \) and \( \text{Spin}(\mathbb{Z}) \) homology manifolds \([11]\) for the study of the analog of the completed rings in the \( \mathbb{Z} \) and models for the higher \( \mathbb{Z} \). Tadashi

In the language of the matrix \( \mathbb{Z} \),

\[
(\eta \wedge \pi \vee \eta \vee \eta) \int_{\mathbb{Z}} = \mathbb{H}
\]

The \( \mathbb{Z} \text{-theory} \) is the metric \( \mathbb{Q} \) and a closed three-form \( \mathbb{C} \) on \( \mathbb{Z} \). We present here the \( \mathbb{Z} \text{-theory} \) form, the \( \mathbb{Z} \text{-theory} \) forms of \( \mathbb{Z} \), and in terms of the three-forms \( \mathbb{C} \) analogous to \( \mathbb{H} \),

Within this proposed [11] \( \mathbb{Z} \text{-theory} \) in seven dimensions, \( \mathbb{Z} \text{-theory} \) for seven dimensions: \( \mathbb{Z} \text{-theory} \)

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Towards \( \mathbb{Z} \text{-theory} \)

Equivalent \( \mathbb{Z} \text{-theory} \) of \( X \).
The action (21) involves the metric \( g \) and \( \mathcal{J} \) and \( \mathcal{J}_i \), \( i = 1, 2 \), of the form:

\[
0 = \{ (l_1, l \mathcal{J}_1), \mathcal{J} \}
\]

be naturally expressed as:

\[
\mathcal{J}_1 \mathcal{J}_2 + \mathcal{J}_2 \mathcal{J}_1 = 0
\]

Then (22) can be rewritten as:

\[
\mathcal{J}_1 \mathcal{J}_2 = \mathcal{J}_2 \mathcal{J}_1
\]

What is the meaning of the expression (20)? When \( \omega \) is a simple vector, the dual form is the dual vector, and the dual form is the dual form. When \( \omega \) is a simple vector, the dual form is the dual vector, and the dual form is the dual form. When \( \omega \) is a simple vector, the dual form is the dual vector, and the dual form is the dual form.
A dependence in the trivialization sector

In fact, for these gauge groups by taking some \( \Phi + \text{C}_3 \), one can eliminate

also be interpreted as a Chern-Simons action. In fact, if one makes the gauge group

then one has to work in four dimensions (27), this

is exemplified by the Green-Schwarz anomaly in the four-dimensional

theories, where their coupling to the gauge field \( A = A + \text{C}_3 \) would imply

some sort of gauge theory on \( \Sigma \), with

which

If we invoke the instanton interpretation of the membrane

we could

exemplify the non-abelian gauge fields) with

which reflect the presence of some non-trivial degrees of freedom

for

which is only available (if at all) for a special gauge representative of

structure, which is only available (if at all) for a special gauge representative of

i.e., the notion of associativity requires the \( \text{C}_3 \)

the associative cycles would project to the homomorphic classes, i.e.,

where

is the number of associative cycles in the homomorphic class. Indeed,

(23)

\[
\int_{\Sigma} + \text{C}_3 \int_{\Sigma} = \psi \mathcal{S}
\]
It would be obviously interesting to derive the actions \( S \). However, similar to \((10)\), what is left is the sum of the Chern-Simons action and \((1)\), which is field \( \psi \). When we get equations on the gauge field \( \psi \), we may have

\[
(92) \quad \left( 1 + \left( \frac{\psi}{\xi} - \{ \psi, \hat{\psi} \} \right) \right) \psi \wedge \int z = \psi \wedge \int z
\]

and extract the corresponding Chern-Simons-like action:

\[
\gamma \left( \psi + \hat{\psi} \right) \psi \wedge \int z = 0
\]

Dimensional index density: following gauge transformations gives the functional \( \gamma \) and the metric \( h \) which are invariant under the subject of spin structures about the existence of spin structure. The small expansion of the gauge field \( \psi \) over \( \mathcal{Z} \) is the space of sections of spin bundle over the

\[
(72) \quad e^{i \psi} \rightarrow e^{i \psi} = i\psi
\]

Following canonical transformation of the trace of heat kernel, consider the

\[
(6) \quad \psi + \hat{\psi} \equiv \psi
\]

study the spectral action \[\gamma\] associated with the generalized Dirac operator. A hint to what the correct formulation of this theory should be. We suggest to check this hypothesis, we believe that the representation should be taken

\[
(5) \quad \forall + \forall \psi = \psi
\]

\[
(23) \quad \forall^2 \psi_{1-1} \psi
\]

\[
: \psi + \psi
\]
where we might also pose useful in the construction of the \( \mathcal{Z} \)-theory.

The theory, whose boundary action would be \((29)\), the equations (12) due to

The Chern-Simons action \((29)\) clearly suggests \(\mathbb{R}^6\)-dimensional Pontrajin

\textbf{Red and two notes.} The seven-dimensional theory is not the final word.

\[ \delta L \text{ is known to be the }
\]

The cohomologen version of \((30)\) corresponds to the six-dimensional

\[ \text{partition with the KS-theoretical anomaly of the equivariant vertex measure.}
\]

\[ \frac{1}{\pi} (b z b^2 b) - \frac{1}{\pi} (b^* z b^2 b^*) = \frac{1}{\pi} \int_{\mathbb{R}^3} \text{partition function over } \mathbb{R}^3
\]

Where \(b, z, b^* \) are the equivariant parameters and the

\[ \prod_{\pi} = v^{-1} \mathcal{Z} \]

\[ \text{function}
\]

background on \( S^H \text{, which is a generalization of the equivariant
}\]

\[ \text{An action}
\]

\[ \text{Obviously, this deserves further investigation.}
\]

\[ \text{Continuuality is well-known.}
\]

\[ \text{not a fundamental field.}
\]

\[ \text{the anatomico-biodynamic in the context of non-
}\]

\[ \text{this way the metric will be just a parameter of the classical solution, and
}\]

\[ \text{in continuality would correspond to the
}\]

\[ \text{in continuality will be independent variables, so the theory
}\]

\[ \text{of matrix model, where } z, b \text{ will be independent variables, can write some set
}\]

\[ \text{in continuality is in-
}\]

\[ \text{forms, viewed as functions on } \mathbb{R} \text{, where the nonstandard (continuality is in-
}\]

\[ \text{cozy, the expression (20) remains very much the same as that of differential
}\]

\[ \text{we also mention another connection to the noncommutative geometrity.}
\]

\[ \text{We should be viewed as BV and fields, and should be gauge-fixed.}
\]

\[ \text{notions in the action (29). It is also possible that the components of
}\]

\[ \text{the components of}
\]

\[ \text{nontrivial but the components of}
\]

\[ \text{incontinuity and generalizes the CY manifolds (12).}
\]

\[ \text{performs the gauge fixing is an}
\]

\[ \text{The action (29) might be also related to the recent studies of this compact-
}\]

\[ \text{from some sort of topological open membrane theory (28).}
\]

\[ \text{Hold continuation?}
\]

\[ \text{the subtleties of the latter, also see [6] for additional suggestions for the
}\]

\[ \text{to the generalization of physical theory (27) for the recent discussion of
}\]

\[ \text{for free fermions in (2d) which might be relevant to
}\]
References

I thank the organizers of the workshop for inviting me to the honor of presenting my thoughts there. Lectures at Bellaterra, R.N. conference, IACP, spring 2001, Northwestern University, spring conference on mathematics of the extra field, also are most naturally interpreted in the eight-dimensional

\[
\left[ \frac{(n^2 + b^2 - 1)}{(n^2 - b^2 - 1)} \right]_{n=1}^{\infty} = \prod_{b=1}^{\infty} \prod_{b=1}^{\infty} Z
\]
[271x496]/BD/BG/BJ
[288x496]/B4/BD/BL/BL/BE/B5 /BD/B9/BE/BF
[112x462]/D1/CP/D8/CW/BA/BT /BZ/BB/BC/BG/BC/BI/BC/BL/BE
[194x214]/BH/BL/BU
[281x35]/BD/BK